

## **SCHOOLING FOR TOMORROW: THE “TOOLBOX FOR FORWARD-THINKING, INNOVATION, AND SCHOOL SYSTEM CHANGE” – ANALYTICAL, METHODOLOGICAL AND OPERATIONAL IMPLICATIONS**

This Note outlines the Schooling for Tomorrow “Toolbox for Forward-thinking, Innovation and School System Change” and presents the on-going work in the three component activities to this project: i) developing the analysis around schooling scenarios; ii) creating an operational “toolbox” with volunteer “inner core” systems; and iii) understanding demand for schooling. This presentation incorporates outcomes from the Poitiers Forum which addressed the first two of these constituent activities. The Note then outlines how the work on demand can now be advanced as an integral element of the programme.

While for operational purposes, it is useful to distinguish the three component activities, they all contribute to the Toolbox. As this phase of the *Schooling for Tomorrow* programme advances, the different activities will increasingly merge into the larger enterprise. As well as the OECD- and country-based activities, the work is being implemented through a series of annual Forums. The first of these took place in February, 2003 near Poitiers, France, and further such events will take place at approximate one-year intervals in 2004 and 2005 at sites that have yet to be identified.

### **Recent Progress**

The recent Forum took place 12-14 February, 2003 in the “*Institut International de la Prospective*” at the Futuroscope Park, near Poitiers, France. It was organised in partnership with the *Conseil Général de la Vienne*, the *Région Poitou-Charentes*, and the Futuroscope Park, who provided an excellent conference environment. It was attended by approximately 85 participants, including national representatives from 24 countries, representatives of the Pacific Circle Consortium (PCC), Environment and School Initiatives (ENSI) and TUAC, invited experts, and around 10 educational leaders from the region as observers.

The Forum discussions built on the progress made on *Schooling for Tomorrow* on a number of fronts. In 2002, substantial efforts were involved in completing the publication on networks and innovation (*Networks of Innovation: Towards New Models for Managing Schools and Systems*); building up the “operational toolbox” with the volunteer systems (to date, England, the Netherlands, and Ontario, Canada); continuing the scenarios analysis of CERI and IFP<sup>1</sup>, and organising the Forum itself. The report “School: A choice of direction” was also completed and the follow-up of the report would be within through the *Schooling for Tomorrow* programme.

### **The “Toolbox for Forward-Thinking, Innovation, and School System Change”**

The starting point for building the Toolbox may be summed up in two apparent paradoxes. First, despite the very long-term aims and impacts of schooling, a great deal of educational policy and practice continues to be dominated by the short term, leaving them ill-equipped to deal with complexity and change. The

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<sup>1</sup> The International Futures Programme (IFP) is the unit within the OECD advising its Secretary-General and other senior officials on long-term prospects and has just completed a comprehensive assessment of the potential for major technological, economic, social and governance transformation in the 21<sup>st</sup> Century. (see OECD/IFP 2001, 2000, 1999, 1998).

necessary “tools”, even the vocabulary, for long-term thinking are largely lacking. Second, as concluded through the complementary CERI work on knowledge management, despite education being overtly about knowledge itself, its own knowledge base remains largely tacit, fragmented and underdeveloped. These together argue for the compilation of approaches, techniques and methods that can foster informed dialogue and professionalism, the strategic and the long term. Such approaches are appropriate for the new context of 21<sup>st</sup> century societies, characterised by complexity, networking, and creativity.

### *The “tools”*

Some of the tools are analytical and methodological, compiled by the OECD from a variety of inputs. These include particular methods for futures thinking, like surveys of trends, structured interviews with experts, etc. and the specific analytical outcomes relating to the future such as the scenarios developed by CERI and IFP. Some are operational tools, and their development and field-testing depends crucially on the participation of the volunteer “inner-core” systems - currently, England, Netherlands and Ontario, Canada with others possibly coming on stream. They are using and evaluating forward thinking as part of change management in policy and practice related to specific challenges and with the active involvement of the relevant stakeholders in their systems. Often, the different sets of tools are used together. The most important “output” is actually the learning that occurs while people are engaged in thinking more rigorously and strategically about how the present: the process is then also the product. The main international events are the annual Forums, including the recent one in Poitiers. The tools to be developed and evaluated will be of very different kinds and will draw on both OECD sources and country-based approaches/strategies.

### *Building on OECD tools and sources*

The existing OECD tools consist of those already developed by CERI and the IFP, as well as the further synthesis and compilation in other relevant fields of OECD analysis.

- *The CERI schooling scenarios* are themselves an innovative tool for forward thinking (OECD 2001). They will continue to be refined and further analytical work undertaken based on the scenarios: the identification of possible indicators to show trends towards each scenario, it was agreed at the Forum, depends on additional refinement.
- *21<sup>st</sup> century Transitions*: the OECD/IFP's systematic vision of the potential for, and obstacles to, societal transformation in the 21<sup>st</sup> century provides a complementary approach to the CERI schooling scenarios. An important methodological tool is the long term “possibility-space” approach to thinking about the future of schooling, society and the economy (see OECD/IFP 2003).
- *Approaches to knowledge management*: the compilation of approaches to strengthen knowledge management in schools and school systems that have already been revealed through the complementary CERI analyses in this field, as well as the earlier Schooling for Tomorrow work on networking (e.g. OECD/CERI, 2000, OECD/CERI 2003).
- *Using indicators for forward-thinking*: With considerable efforts devoted through OECD to build a system of comparative education statistics and indicators, (PISA, *Education at a Glance* etc.), the interest for the Toolbox are models for using them as inputs to forward thinking, innovation and system change, with particular interest on how the quantitative may be combined with the qualitative.

- *Forward-thinking tools from other sectors*: strategies, and approaches being developed in sectors other than education. Certain of these have already been analysed in the CERI knowledge management work and in the IFP programme, but will draw also on the work of other sections of the OECD.

The analytical work described in the next section refers to the continued deepening of the scenarios, but there will be reviews conducted across all these areas, based first on existing OECD sources. These are areas where additional inputs may well be sought from countries in preparation for the next Forum as part of building the Toolbox.

#### *Tools developed and tested in the volunteer systems*

The “inner core” volunteer systems are organising dialogues to use and field-test tools for forward-thinking and innovation in schooling, in co-operation with the OECD. They have made available the resources to allow this process to take place. The tools themselves may use or parallel any of the five areas outlined in the previous paragraph, as well as others. The key point is that they are being used and field-tested to address on-going priorities of educational policy and practice in the volunteer systems, not as theoretical exercises.

Those engaged in the dialogues include education authorities, the different players providing leadership, professional development and policy advice, and educators; ideally, they should bring in stakeholders from beyond the schooling system. Each “inner core” volunteer system is engaging a small study team to record and reflect on the use of these tools, and their value to re-evaluate on-going reforms and inspire strategic reflection. These evaluations are essential if the approaches applied may be used by other systems in the future.

#### ***The “box”***

The Toolbox should ultimately be of value across all countries, not only those working intensively on *Schooling for Tomorrow* as volunteer systems. As the contents begin to take shape, it becomes important to consider the “box” as well as the “tools” that fill it. It will most likely need to be web-based, and a range of issues will arise concerning format, contents, quality, updating, linguistic accessibility, and ownership. These issues might best be considered at the next Forum in early 2004 when the contents are more clearly defined, and that might also be the occasion to consider how best to extend the national input beyond the specific volunteer “inner core”.

### **The on-going *Schooling for Tomorrow* Component Activities**

#### ***i) Developing the scenario analyses***

As an operational tool, the CERI schooling scenarios<sup>2</sup> have already proved their value and continue to do so in the “inner-core” system activities. During the Forum, most participants identified their own school systems as excessively anchored in the bureaucratic models characterised by Scenario 1.a., although moving – more or less slowly – in the direction of “re-schooling” rather than “de-schooling”. Their value to date, however, does not mean that they should not be further refined, and this process will continue

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<sup>2</sup> There are three sets of scenarios, each with two thus giving six scenarios in all: 1. ATTEMPTING TO MAINTAIN THE STATUS QUO [Scenario 1.a. "Bureaucratic School Systems Continue"; Scenario 1.b. "Teacher Exodus – The Meltdown Scenario"]; 2.RE-SCHOOLING [Scenario 2.a "Schools as Core Social Centres"; Scenario 2.b "Schools as Focused Learning Organisations"]; 3.DE-SCHOOLING [Scenario 3.a "Learning Networks and the Network Society", Scenario 3.b "Extending the Market Model"].

throughout the next phase of the project. The discussion at the Poitiers Forum helped to identify areas calling for further analytical work of three different kinds:

- Further definitional work and clarification needs to be given to the *scenarios* themselves, especially the “status quo” scenarios. The latter are not yet adequately specified in terms that open them up to more precise quantitative assessment: they are still excessively defined by lack of change rather than observable scenario characteristics; they rely on terms with heavy negative connotations; the concept of “status quo” is misleading for systems that are changing and whose starting points differ. The “meltdown” scenario 1b is partial in focusing so strongly on one particular trend – severe teacher shortages – though it has supplied one of the most policy-relevant aspects of the scenarios in helping to galvanise debate. There have been several calls for greater disaggregation of the scenarios to reflect the age of students/levels of schooling.
- The *dimensions* within the scenarios could be further developed. The “goals and functions” dimension in particular is very broad and still needs further refinement. A repeated demand, heard again during the Poitiers discussions, is for elaboration of the social, economic, and governance contexts consistent with each scenario. This is additional to, not instead of, their specific educational focus. Given the centrality of teachers, this dimension could with value be further developed using available evidence.
- Certain *topics* that affect all the scenarios could usefully be further developed, as suggested during the Poitiers Forum and Toolbox country discussions. The role of public policy is one example; as currently formulated the scenarios have been interpreted by some (wrongly) as supposing a strong government role to be characteristic only of Scenarios 1a and 1b. Equity issues have been proposed as warranting greater elaboration. The use of ICT within each scenario might be better analysed.

Further analytical work will thus address these different points. On ICT and teachers, there will be collaboration with other activities in the OECD. On ICT, a fruitful collaboration with an activity that will identify future models or “scenarios” relating to its main themes – resources, administrative and legal frameworks, teachers, and equity is envisaged. On teachers, the collaboration may be more direct. The activity on teachers is generating a rich source of practices and data relating to teachers that may be analysed in terms of the CERI scenarios in ways beneficial to both activities. This will take place in 2003.

Only with this further work advanced will it be possible to ascertain the room for developing indicators to help chart the progress of education systems towards one or other of the scenarios. At present, the views of educators from many different countries is that the main trend, so far as it is discernible at all, is from the bureaucratic models towards “re-schooling”. Any move towards markets and “de-schooling” appears to most to be unlikely for the foreseeable future, though they should not be ignored in any subsequent indicator development.

The parallel work carried out by IFP has envisaged conditions for the emergence of 21<sup>st</sup> century transitions and the learning society that indeed would imply a considerable degree of “de-schooling”, (OECD/IFP 2003). This work has elaborated the possible features and conditions for one encompassing long-term scenario covering the different economic, technological, social and governance fields. It has identified different “possibility space” variables<sup>3</sup> to argue that the shift from the mass era to the learning society, consistent with the main transition-scale scenario, requires a large measure of consistency and synergy across these variables. On this basis, the analysis elaborates four schooling models corresponding to the

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<sup>3</sup> Summarised in the paper as ease of use, range of use, level of task predictability, autonomy, heterogeneity and scale of affiliation, range of choice, transparency and information access, and experimentation and reflection.

breadth/specialisation of the functions which schools perform (the functions being custodial/behavioural, knowledge, socialisation, and screening/sorting). In the first two models – “supply diversity” and “mass customisation” – schools would not be central contributors to transition-scale change as they seek to maintain a wide range of these functions<sup>4</sup>. Only with a substantial degree of “de-schooling” of certain of these functions, however, might the major transformations become apparent as either the third model (“learning benchmark”) or the fourth (“learning broker”).

The analytical work will also draw on the results a large study being conducted by research teams drawn together under the auspices of the Pacific Circle Consortium (PCC) (Cogan and Baumgart, 2003). This has begun with a survey to ascertain the views of over 300 senior education officials and policy makers in 11 societies drawn from five regions of the Pacific Rim. Participating societies include Australia, China, Hong Kong (SAR), Japan, Korea, Mexico, New Zealand, Taiwan, Thailand, the United States and Viet Nam. The survey sought rankings of the six OECD scenarios in terms of their perceived desirability and probability. The next phase of the study is now underway, seeking to understand why senior educators and policy-makers ranked current bureaucratic models as most likely to continue despite judging that they are not the most desirable scenarios. Between five and ten of these leaders are being interviewed in eight of the 11 societies. This phase of the project is expected to be reported at the 28<sup>th</sup> Annual PCC Conference in Hong Kong, Spring 2004.

#### *ii) The Operational Activity in the “Inner-core” Toolbox Systems*

The purpose of the operational, country-based Toolbox activity was described earlier. The participating systems are England, the Netherlands, and Ontario, Canada, and they have engaged in the process with a commitment of energy and resources. They have identified particular target initiatives or focal points for the Toolbox dialogues, referred to as “laboratories of change”. These are: (Ontario) Vision 2020: French Language Education in Tomorrow’s Ontario and the Teaching as a Profession Project; (England) initiatives directed at Highly Innovative Schools and Schools Facing Challenging Circumstances; (the Netherlands) ‘Initiative-rich’ Schools and Educational Opportunity Policy.

The Vision 2020 Initiative in Ontario concerning the French-language system has assembled a panel of experts from diverse backgrounds, charged with visualising desirable futures for this system. It aims not to validate a specific course of action but to produce the capacity to produce good policy by developing and validating a set of policy tools. It intends to produce a visualisation guide that will serve to frame issues in clear actionable terms. On this basis, field consultations with stakeholder groups in the latter half of 2003 will be followed by a wider Forum in 2004. Using the tools developed or adapted, alternative courses of action will be put forward by analysing the distance between the desired scenario-related trajectories and current developments. The Ontario “Teaching as a Profession” project is using alternative futures as a means to stimulate dialogue among the range of relevant stakeholders over the nature of the teaching profession. It has engaged a facilitator/research team and established a wider study group. While the OECD scenarios have provided the initial stimulus, this project has worked towards its own formulation of scenarios, embedded in the Ontario context. Thus the process is designed to create a series of preferred scenarios as well as robust strategies for meeting them. A strong emphasis is placed on dialogue and capacity building, and intense rounds of workshops are taking place throughout 2003.

The main launch event for the England Toolbox activity was a national residential seminar held in December 2002, at which over fifty senior policy-makers and school leaders in England were brought together at the National College for School Leadership (NCSL). The purpose was to consider the potential for developing a toolbox of ideas and processes which policy-makers and school leaders could use to explore the scenarios and inform their planning. Participants included an invited group of innovative and

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<sup>4</sup> The implications of these two models will be further explored as part of the work on “understanding demand”.

outstanding leaders working in schools in challenging circumstances, as well as chief executives and senior officers from national policy, training and development organisations. This was probably the first time such a broad based group of policy-makers and practitioners had been brought together in this way in England. High expectations were raised by the process so begun, and the value of such national and international dialogue. It is intended to work on a “toolkit” designed especially for the English context and to organise a series of follow-up events with targeted key groups of stakeholders. A particular focus in 2003 will be given to the “laboratories of change” of innovation-rich schools and those in challenging circumstances.

In the Netherlands, the process and focus of Toolbox dialogue will begin after the Poitiers Forum, to continue throughout 2003. Both of the reforms that constitute the “laboratory of change” initiatives – Initiative-rich Schools and the Educational Opportunity Policy - can be understood as consistent with Scenario 2b, “Schools as Focused Learning Organisations”. They are based on school-led experimentation and innovation, and emphasise the responsibility of schools for educational choices and corresponding personnel policies and financial management. Such responsibility is expected to foster professional expertise and satisfaction, effective partnerships with others in their wider environment (parents, local communities, civil society), and especially enhanced educational quality. The link between these reforms and instruments in the OECD Toolbox is not only that the scenarios are helpful for policymakers and schools to help clarify their picture of the desired future but also that these initiatives are ways of taking the steps towards that future.

### *iii) Understanding Demand for Schooling*

The interest in demand as an integral element of *Schooling for Tomorrow* is summarised in the following questions:

- Many observe with approval a general trend away from supply-dominated to demand-driven provision, most recently the CEOs meeting in Dublin in February, 2003. What does “demand-driven” mean in practice, and how far might the trend be expected to go? If it will continue, what are the long-term implications for systems that are responsible for ensuring the “supply”?
- One of the most pertinent dimensions of the CERI schooling scenarios in terms of change is that of attitudes and expectations – of parents, of students, of specific interest groups, of the public and the media. That parents and the public are more educated and knowledgeable than ever exerts its own intense pressures on schools. If schooling is becoming more demand-driven it is important to understand better the relevant evidence on expectations so as to gauge its likely influence.
- The discussion at the *Schooling for Tomorrow* events has revealed the deep-seated reluctance of educators to embrace the market scenarios; the Poitiers Forum workshops confirmed that few of them even see this scenario as likely, regardless of desirability. How does rejection of market orientations as either likely or desirable relate to the endorsement of responsiveness to demand?
- More specifically, new governance and accountability arrangements have often been introduced specifically with the aim of permitting greater choice and promoting “client” influence on schools and systems. At the same time, many worry about possible undesirable consequences such as the inhibition of innovation and experimentation, or the widening of social inequalities. What do we know about the educational and social impact of reforms of governance aimed at enhancing the role of choice and “client” demand?

- Many regard values as belonging at the heart of education, raising critical issues of socialisation, and of fostering citizenship, diversity and tolerance. The burden falling on schools grows with the fragmentation in institutions, such as families, churches, or local communities, which traditionally have shared these responsibilities. The explicit treatment of values by schools, however, can quickly run right up against very legitimate concerns about orthodoxies and indoctrination. This is thus an area riven with uncertainties. Does a direct focus on demand promise a more constructive discussion of values?

The interest in addressing these issues surrounding demand was confirmed at Poitiers. It is an area that needs to be based on a firm foundation of research evidence. Accordingly, it is intended that a national report will be invited from each Member country to provide a synthesis of research according to a common set of questions. There is a need for very careful attention to the evidence as revealed by research studies and evaluation. The following framework will be revised and finalised before the summer 2003 before mailing to countries.

Country reports will be prepared, and it is expected that each will cover the following broad areas. In many cases, the relevant studies will have been carried out in particular localities that cannot be taken as nationally representative; different studies may provide contradictory findings. While the below headings are presented in terms of “demand” it is recognised that outcomes are critically shaped by the “supply” on offer.

1. *Expressed demand - attitudes and expectations of parents and the public towards schools:* In many countries surveys are conducted of attitudes towards schools. While sometimes they may be little more than a form of marketing of satisfaction levels, often they are considerably more sophisticated and robust. The surveys may relate to schools in general, to local schools (including those attended by parents’ children), or to aspects of schooling such as the teaching force. Where the evidence permits it will be useful to distinguish between different groups, whether defined by socio-demographic criteria for parents and the public such as by age, SES, ethnicity, or by stakeholder membership such as employers, trade unions or political parties.
2. *Revealed demand – student choices and retention:* While recognising that student choices are heavily influenced by those other than young people themselves, as well as by available options among which choice is possible, an important element of demand is nevertheless expressed through learners themselves. Three main areas deserve particular attention: choices of programme (including academic and vocational programmes); engagement in learning, motivation and absenteeism; staying-on/retention. While much attention has focused on the latter years of secondary schooling and transition, the interest for this study relates to learners in all cycles of primary and secondary schooling.
3. *Revealed demand – social and parental choices:* A number of systems have deliberately sought to enhance the role of parental choice within public provision, such as by enhancing the range of schools available to the same families or by giving parents larger powers to exercise choice. In some cases, these include “voucher”-type experiments. How have these been exercised and by whom, set in the context of extent of choice available? It will also be valuable to compile findings relating to alternatives to mainstream public provision. This could include take-up of private options where these exist, the incidence of “home-schooling” as a substitute or as a complement to mainstream provision, as well as the level of interest shown in alternative schools with experimental pedagogies.

It would also be valuable to move beyond these three areas that lend themselves to reviews of existing evidence to gain a deeper understanding of the determinants of demand and the inter-dependence of the

demand and supply sides. Drawing on the analysis and models of schooling developed by IFP, the shift to so-called “mass-customisation” in many different areas, from manufactured goods to education, poses organisational challenges of signalling and capacity, both within and between institutions. It is largely taken for granted that consumers know what they want and how to procure it; the mechanisms for consumer redress, product guarantees, and so forth are well established in the mass market. These cannot be assumed to hold with the shift to distinctive products and to customised services, including education. Are “consumers” able to assess and choose effectively? Are the signals like price or indicators of utility and future value clear when services are unique, such as a personalised learning path?

One way forward would be to review the ways in which universal “customisation” is being attempted in different systems, and to ask about the conditions, capacities and commitments that educational institutions will need to offer meaningful personalisation of educational provision in 21<sup>st</sup> century societies.

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