QUALITY EDUCATION FOR ALL

A REPORT ON EDUCATION IN SINGAPORE

BY
THE ASSOCIATION OF WOMEN FOR ACTION AND RESEARCH (AWARE)
EDUCATION SUBCOMMITTEE
SEPTEMBER 2001

EXECUTIVE SUMMARY

Introduction

Singapore's education system is a subject of critical importance to the well being of Singapore women, who make up the majority of teachers and, as parents, often shoulder the principal responsibility for monitoring their children's educational development. This prompted AWARE to look into the issues facing Singapore's education system in the light of the MOE's statement of "The Desired Outcomes of Education" (1998) and the inauguration of the Prime Minister's S21 vision of a more participatory society. AWARE's engagement with this subject has encompassed:

- Holding a series of six Focus Group Meetings (FGM) with teachers, parents and education experts to gather feedback and suggestions between November 1998 and April 1999.
- Holding a public forum on 4 September 1999 attended by over 200 parents and leachers on the issues facing our education system.
- Organising and processing questionnaires, which were distributed at the Forum.
- Attempting to raise the level of debate on education issues by writing to The Straits Times Forum page.
- The submission of this Report to the Ministry of Education outlining areas in need of reform.

Findings

AWARE's research identified the following areas where the Singapore education system was not living up to its own stated goal of developing thinking, "well-rounded" citizens –

- The ever-increasing spiral of competition over quantitative academic results between and within schools, a trend which was not substantially changed by the announcement of the reduction of the syllabus by 30% from 1999 onwards. This has resulted in:
 - Excessive pressure being placed on children to master content, to the
 extent of damaging the quality of family life and the psychological well being
 of the child.
 - School principals becoming preoccupied with the quantitative academic results on which the ranking of their school would be based, at the expense of the holistic development of the child.
- The practice of streaming in its current form, which is not only unfair due to the use of a number of "high-stakes" examinations to stream pupils, but also leads to an asymmetrical allocation of resources between elite and neighbourhood schools.
- 3. The unreasonable demands being placed on teachers coupled with insufficient support, e.g. large class sizes, pressure to deliver academic results at all costs. This has led to inadequate teaching standards, the increasing recourse to tuition and an unacceptably high teacher turnover rate.
- 4. The insufficient resources currently being allocated to the education of children with special needs. Presently, these children are educated in schools operated by voluntary welfare organisations (VWOs) rather than the Ministry of Education.
- The inadequate consultation and communication with parents on the part
 of the majority of schools which prevents parents from working with teachers to
 optimise the child's holistic development and address problems in a concerted
 manner.
- 6.1 The lack of sensitivity by teachers to differences in culture, which leads to discriminating and alienating practices in the classroom.
- 6.2 The poor implementation of the drive for "Thinking Classrooms" which has not been accompanied by a progressive improvement in the design, supervision and measurement of student work.

RECOMMENDATIONS FOR EDUCATIONAL REFORM

The following Recommendations are submitted in keeping with the Findings of this Report

Recommendation 1 - Progress Indicators

To design new and more holistic indicators of student progress to replace the current over-reliance on quantitative academic results derived from "high-stakes" examinations.

Recommendation 2 - Streaming

To review the current system of streaming in order to introduce alternatives that better serve the goal of equal opportunity.

Recommendation 3 - Student and Teacher Workload

- 3.1 To reduce curricular workload so as to give more time for students to develop their talents in non-academic aspects of their lives and for teachers to engage with students individually and to plan lessons more creatively.
- 3.2 This should be done in conjunction with implementing more family-friendly policies in schools, in the knowledge that a greater degree of personal well-being amongst teachers will have positive spin-off effects on the quality of teaching they render.
- 3.3 Teachers of different subject areas should co-ordinate the setting of projects, so that at any given time, only one project is set for the students. No homework should be set for weekends, public holidays or the days before and after a major school event to facilitate time to be spent with families or for social events.
- To make the reduction of class size a medium-to-long-term objective, while in the short term developing teaching assistants to provide support to teachers for more individualised teaching and learning.

Recommendation 4 - Children with Special Needs

- 4.1 To bring special schools currently administered by VWOs under the MOE. The integration of mildly disabled students into mainstream schools should be continued. The status of teachers of children with special needs should be raised by enhancing their remuneration, training opportunities and career development. More therapists should be attached to mainstream schools to aid in diagnosis and follow-up for children with special needs.
- 4.2 To create multi-disciplinary panels in schools to monitor the progress of children with special needs. These panels should include parents, teachers and therapists/health specialists.

Recommendation 5 - Communication and Consultation

- 5.1 To increase the level of communication within the educational system so that teachers, parents and students are fully apprised of their option.
- 5.2 To create formal and informal mechanisms to ensure that parents and teachers engage in more two-way communication.
- 5.3 To promote adequate representation of parents and community leaders on the advisory committees of schools, so that the interpretation of national policy at the school level is done with the involvement of all stakeholders.
- 5.4 To disseminate information on MOE or external workshops to parents and other interested parties for feedback to facilitate policy-making and policy implementation.

Recommendation 6 - Teacher Development

- 6.1 To include a strong element of cultural sensitivity and diversity awareness in teacher training courses,
- 6.2 To facilitate a greater degree of peer-to-peer networking within the teaching profession.

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Part 1 - THE CALL FOR REFORM

Introduction

It has become a global phenomenon to link a nation's economic progress directly to its human capital. The quality of this resource is taken to depend in turn on the quality of its education system. In the past few decades, this inextricable economic-education bond has driven and underpinned many national education policies and pedagogical practices. However, starting in the 1990's, both in the West and East, there has been a growing recognition and acknowledgement that reducing the school's role to producing human resources to implement economic policies brings on unexpected, often negative, results. If educational organisations continue to become an extension of the government economic policies, the warning signs show that this poses risks to many aspects of life within the nation.

National Day Message

In his 1999 National Day rally speech, PM Goh Chok Tong called on the nation "to look beyond the region and to strive to become one of the best economies in the world". He pointed out that the way to achieve this is "to develop first class education". However, he added that "earning money is not the sole objective of life or education. A community of any quality should have a whole range of skills and interests". A number of policies had already been designed and implemented at all levels of local education and training but their implementation in schools did not seem to support the caveat the PM added to his call for "first rate education".

Singapore 21

In 1997, the PM had launched the Singapore 21 Committee to clarify what Singaporeans desire for the future of their nation. Five new ideals were added to the existing ones. They are:

- every Singaporean matters
- strong families
- opportunities for all
- feeling passionately about Singapore
- active citizenship

The Singapore 21 vision seems to be broader in scope since it includes more than economic and academic benchmarks to determine success. The same year, the opening of the 7th International Thinking Conference saw PM's Goh's call to Singapore to adopt a "Thinking Schools, Learning Nation" approach to education in preparation for future economic growth in a knowledge-based economy. This call was followed by the PM's 1999 National Day message not just to "know existing knowledge" but also to "create new knowledge". The system that had moulded efficient, obedient workers who rely totally on their bosses to do their thinking was rapidly becoming ill-equipped to address the requirements of a knowledge-based economy. SM Lee Kuan Yew stressed the worth of every individual when he launched the 1999 Productivity Campaign with the message that "every worker makes a difference".

Desired Outcomes of Education (DOE)

In 1998, the Desired Outcomes of Education (DOE) document outlining the vision for Singapore education was drawn up by the Ministry of Education (MOE) after consultation with principals and teachers. In it, the Director-General of Education, Mr Wee Heng Tin, stressed that "apart from skills and knowledge, children need to cultivate sound morals, strength of character, healthy habits, team spirit and an aesthetic appreciation for the world around them". He encapsulates the main thrust of the document when he states explicitly, "We (the MOE) want to help our children develop as individuals, according to their talents and abilities, and to grow into responsible and committed citizens".

With these three major national developments came numerous policies aimed at infusing them into every aspect of education. A holistic education, enrichment programmes, IT schemes, National Education, creative and critical thinking initiatives and increased empowerment for principals are just a cross section of what has been introduced in the past few years.

Education – A Big Worry

However, these swift changes in education have aroused great anxiety in parents. The main finding of 1999 Ministry of Community Development survey on local family life was that their children's education is the biggest worry among parents. Family life in Singapore "faces potential strains", claims the report, a trend antithetical to the Singapore 21 vision that places great stock on "strong families".

No one argues with the vital role that education continues to play in Singapore's continued economic growth. However, it is the type of education that is evolving in direct response to national policies that is developing into an area of concern for all those directly or indirectly involved. National policies seem to be formulated to address some immediate or future economic need, but it has now become important to tailor them to match the changing profile and needs of Singaporean parents, children, teachers and all other stakeholders in education.

Media interest

If the extent of media coverage, editorial comment and readers' responses to education issues are to be taken as signposts of the growing awareness and participation among people, there is a marked increase in both. The media identifies

education as one of the "hot topics" for 1999's Budget debate. A sample of the headlines in The Straits Times over a period of six months of 1999 alone reflect the issues and controversial debate that education policies have generated.

- "Let children be children, give them time to grow" is an impassioned plea from a
 mother of a child about to go to school (3 Aug).
- Education Minister Teo Chee Hean assures Singaporeans that "top schools here compare with the world's best and quality education is delivered to all" (17 July).
- "Educating my children wears me out" bemoans a mother (25 July).
- The Director of Schools, Ms Lim Soon Tze clarifies the MOE position as "The thinking on class sizes has not changed" (27 Apr).
- "Smaller classes = better pupils" (1 May).
- "Tuition may hurt grades" (15 Jun).
- "Tuition can help, so push children" (23 Jun).
- "Reasons for SAP schools unconvincing" (2 Apr).
- "Shifting the spotlight to weak pupils" (24 Apr).
- "Allow more time for school projects" (23 Mar).
- "More offences by secondary girls" (14 Sept).
- "Parent power the way for schools to go" (10 Sept).

When approached for her views on these issues, life-long educator Dr Lau Wai Har warn's against the Singapore education system being "too elitist" and the potential danger this has of creating "a more hierarchical and polarised society". She calls for a need to "restore the balance" by reallocating resources to "improve some areas" of what she feels is potentially "a good, effective education system".

More Recent Comments

"Scary how kids fear exams"
"Most children worry about failing in exams"
(Nov 21, 2000):

- Exam fear is the number one concern for Singapore children aged 10 to 12.
- I've seen similar surveys results in Britain, Australia, and the United States and the fear of exams does not even come within the top ten fears of children of the same age," Dr. Brian Yeo, consultant psychiatrist.
- One third of Singapore children think that sometimes life is not worth living. Of those who said life is not worth living, most also said they feared sitting for examinations and not scoring high marks (Nov 21, 2000).
- "A Day in the Life of a Child" (Nov 22, 2000).
- The average 10 years old spends six hours in school and eight hours on homework and tuition.
- One in two kids fear failing tests or examinations and not scoring high marks.

In his annual Chinese New Year message, Prime Minister Goh Chok Tong "urged Singaporeans to make time for their families". "Unless Singaporeans make a special effort to maintain a balance in their lives, the pressures of an increasingly competitive economy would soon weaken family bonds," he warned.

"The future model of success will be a person with ideas, not straight As". "Education more than good grades" (Nov 25, 2000).

AWARE's Involvement

The advocacy group; the Association of Women for Action and Research (AWARE), formed in 1985, has an overarching objective to "promote the full participation of women in all areas of life". AWARE has always held the belief that education policies have a direct impact on the quality of family life. Its Education Sub-Committee (ESC) was formed in 1998 to focus specifically on education-related matters.

The ESC has taken heed of current education-related issues and believes that they require immediate attention. These growing concerns affect women and also have far-reaching implications for family relationships and lifestyles. These issues have political, economic and social implications for the entire nation.

The ESC fully endorses the DOE and aims to assist in the MOE's attempts to realise the outcomes in Singapore schools. The ESC also reflects Director-General of Education Mr Wee's vision in the DOE document to develop all Singaporean children "to the best that each can be" while their "collective potential... determines the future of our nation". The ESC's proactive stance towards educational issues is in keeping with Mr Wee's timely reminder that "what we do in schools today will shape the future of Singapore".

The ESC has also been alerted to a range of problems and complex issues deemed to result directly or indirectly from the launch and implementation of education policies. Ms. Dana Lam, the Chair of the ESC, outlined her committee's approach to investigating these significant developments in a letter to The Straits Times (22 Mar 1999). In it, she noted that "it is then timely for us to look at some of the practices that are in place where education in Singapore is concerned".

Focus Group Meetings (FGM)

Throughout the period spanning Nov 1998 and Apr 1999, the ESC conducted six informal meetings and organised forums for parents, teachers and other interested and concerned individuals, to actively gather feedback on any aspect of the education system from actual participants and stakeholders. During these sessions, called Focus Group Meetings (FGM), the ESC was alerted to some of the following:

- Demands made by national policies
- Current policy objectives
- Rightful aims for education
- Teachers' and students' workload
- Teacher's status in education system
- Parent-teacher co-operation levels
- Unmet needs of children with special needs

The rate of teacher resignations, increased cases of chronic depression and rising incidents of health problems, and deviant social behaviour among young children and adolescents were other matters that called out for attention. In January 1999, the ESC held a closed door meeting with the then serving Permanent Secretary of MOE to bring up the key issues that surfaced during the FGM.

AWARE Forum

"In the end, it is not what we do not how much we do that matters. What we have to assess is whether all that we do contributes to achieving the outcomes that we desire". This is how Director-General of Education, Mr. Wee sums up the benchmark by which the success of our education system is to be measured.

In keeping with this spirit to constantly monitor, evaluate and modify national policies in a collaborative manner, AWARE organised its public forum entitled Mother, Tutor, Teacher, Spouse: Promises We Make. Targeted at parents, teachers and interested parties, it was held on 4 Sept 1999 at the YWCA Fort Canning Lodge and drew a crowd of 200 participants despite its announcement in the newspapers only two days before the event. The five-hour programme included:

- Presentation of FOCUS GROUP MEETINGS reports by ESC Chair Ms. Dana Lam, and Mr. Leon Perera, member of ESC.
- Papers by three panel members: Mr Anthony Yeo, Clinical Director of the Counselling and Care Centre, Ms. Lim Soon Tze, Director of Schools, Dr Maha Sripathy, a university lecturer.
- Question and answer session.
- Survey questionnaire.

Areas covered at the Forum included:

- The predicament of parents with children with special needs.
- Existing paradigms about education.
- Education policies and family life.
- Desired Outcomes of Education.
- Parent-teacher collaboration.

Report on Focus Group Meetings

In her report entitled <u>Mother, Tutor, Teacher, Spouse: Promises We Make, Ms.</u> Lam shared her experiences as a parent to find answers to two basic questions; What is a school? What is it for? She wondered why, after spending the greater part of their day in school, children still need to be reinforced with tuition, remedial, supplementary classes to barely cope, never mind excel, in school. In addition, the inability of Singaporeans to exhibit character and creativity seem to point to an education system that is failing despite the rhetoric of its success Singaporeans are constantly exposed to.

She noted in particular the type of interaction school authorities have with parents. She felt that "the common denominator among principals and teachers appears to be a rushed demeanour and tone that defy proper engagement with a parent". Whenever parents are brought together in schools, it is often for being "reprimanded" or for absolving blame on the part of the school. In her observation, principals and teachers seem "ill prepared for consultation and engagement; are defensive and system- not people - oriented". To Ms. Lam, there is an immediate need for creative and critical thinking, social and emotional intelligence and communication skills to be cultivated among the teaching and administrative staff.

Paper: The Absent Curriculum

In his paper, The Absent Curriculum, Mr. Yeo supports his continued concern for the way that the Singapore education system is heading. He draws attention to concrete manifestations of its weaknesses. He cites the increase in mental patients in local psychiatric and psychological facilities, the higher divorce rate and the continuing issue of teenage suicide. In tandem with these social problems is the steady rise in demand for the services of mental health professional and family service centres.

He feels that "there is no safety in our schools" for students to think creatively, critically and curiously. He advocates a "different way of knowing and being and learning". But Mr. Yeo's message is not all gloom and doom. He repeatedly points out that all is not lost if Singaporeans realise that they do have a choice, that "we can decide how we want to live and what must matter in life". He recommends that "we expand our paradigm for education, with greater attention given to nurturing students as the ultimate outcome".

Paper: The Desired Outcomes of Education

"We have a good system in place", is the bottom line of Director of Schools, Ms Lim Soon Tze's message. She outlines the MOE's vision and goals for education in Singapore. She links the national slogan Thinking Schools, Learning Nation to the promotion of these educational goals. She points out that high on the list of the DOE is character building.

The ideal product of the Singapore education system is one who is moral, culturally rooted and compassionate. Belief in multiculturalism and meritocracy would be strong in such a person. Other attributes include being rational, committed, innovative and collaborative. It is to produce such a person through the education system, Ms Lim explains, that MOE initiatives such as NE, IT in education and the Thinking Programme are put in place.

Paper: Mother Tutor Teacher Spouse: Concerns and Directions

Education policies, cultural perceptions about education, the bureaucracy involved and inadequate dissemination of information about school matters contribute high levels of anxiety and stress to Singaporean mothers, according to Dr. Sripathy. In her paper, Mother Tutor Teacher Spouse: Concerns and Directions, she advocates that schools need to be accountable and engage with children who spent a good five hours each school day within the premises. She outlines the far-reaching negative consequences of this phenomenon on employment patterns, family ties, levels of communication and outlook on education.

She relates the incessant drive to maximise economic gains to a host of inadequacies within our educational institutions namely: the lack of professionalism, consultation, flexibility, support and time. She is confident that any attempt by the government to re-orientate its priorities in matters related to education and adopting a more humanistic approach to help individual students would be beneficial.

According to Dr. Sripathy, such a move can help students achieve their true potential and welcome parents as partners in doing this. Each child needs to be treated as a potential leader and her/his ability and skills developed. She calls for recognition of

special needs for late developers, the differently able and those with non-academic forms of talent, skills or intelligences. Mutual respect and closer ties need to be forged between the school or the larger community to tap the rich and varied knowledge and resources of parents and others from all walks of life. She concludes that such an approach has the potential for continued economic success while achieving the DOE.

Part II - AREAS OF CONCERN

"Education...a completely human enterprise" Rear-Admiral (NS) Teo Chec Hean

AWARE applauds this reaffirmation of education as a deeply human enterprise. The following areas will have to be looked into to achieve this.

Findings from Forum Survey and Focus Group Meetings

The 200 participants at the Forum completed a questionnaire aimed at eliciting their feedback and recommendations on some of the education issues that surfaced at the Focus Group Meetings. They were also asked to express in writing the direction they envisaged for the Singapore education system, and to make suggestions for their greater involvement in the design, implementation and monitoring of national education policies. The questionnaire comprised 46 statements to which participants recorded their response using a Likehart scale. They were also invited to complete three open-ended questions on the above issues.

Incorporated with the Survey findings are the findings made independently by six Focus Group Meetings (FGM) held before the Forum.

The areas of concern identified are listed in order of importance and their numbering corresponds with that of the Recommendations in the Executive Summary & Part III.

PROGRESS INDICATORS

1.1 Examinations

The education system is tied up too closely to test and assessment scores despite conflicting research on the benefits of such an approach. The focus is on teaching towards a test, or what is termed dumping-down teaching, at the expense of discovery, experimental and hands-on learning. Testing drives the curriculum and rewards mindless memorisation, exam savvy and rote learning.

The growing anxiety among these participants is well captured by politician, Dr. Toh See Kiat (Aljunied GRC) who points out the high costs and counterproductiveness of this trend. "Children are kept so busy here with cramming for examinations that they have no time to be children, to play or even think" (The Straits Times 14 Oct 1999). Parents see no other recourse but to buckle down and keep up the incessant drilling at home. Participants are of the opinion that there is no need to test for streaming from Primary 1 to 3; a practice that stifles creativity and reduces self-esteem at such vulnerable ages.

Adopt an ability-based learning approach if the MOE is serious about its DOE to "help our children as individuals, according to their talents and abilities", urge parents.

Another point participants brought up is how the present system of streaming marginalises or displaces children with special needs who do not qualify for special schools. The common exam papers which children in all streams sit for is unfair to weaker students, and inevitably defeats the main purpose of streaming these students in the first place. Such a system affords only a minimal chance for students in the Normal Stream to do O-levels. If their child fails to get into the "right stream", it quickly becomes the parents' responsibility to support their offspring, not the state's.

1.2 Parents' Expectations

Participants are of the opinion that Singaporean students scoring the highest Mathematics and Science grades in international tests have been achieved at too high a cost. Some feel there is no need for these academic achievements to be publicised as symbols of high societal status. The focus should swing to educational practices that allow children to enjoy their childhood and youth.

Parents urge school authorities to return their children their childhood and family life and not to set homework or remedial, supplementary, enrichment classes or ECA, or projects during their hard-earned vacations.

1.3 Value-based Education?

Participants see very little of the MOE aim to instil "constituents of a gracious society" reflected in the everyday running of schools, where students' feelings, thoughts and choices are not taken into account.

If schools function mainly to raise economic competitiveness, then not enough is being done to develop and sustain self-esteem, character, confidence, morale and a natural love of learning in students, in short, to have the confidence to "believe in their ability". The "lively curiosity about things" that children and young learners exhibit is not tapped or encouraged at the outset. The stress is on conformity and restraints.

The \$1.2 billion investment in computers shows that the emphasis is still on hardware without the much-needed software of staff wellness, conducive surroundings or an interactive environment. Bare walls, dim classes, rigid seating arrangements and teacher-controlled classes still promote the worst practices of a top-down in many schools. Participants acutely feel the lack of time and focus on nurturing children to "appreciate the finer things in life and the beauty of the world around".

1.4 Change Success Markers

It is important to recognise the inevitability and desirability of competition in education. However, when the pursuit of excellence is solely fied up with grades in exit exams, it becomes a national obsession. In a recent interview with The Straits Times, Yale University Professor Robert Stemberg articulated

what most Singaporeans have known anyway. Achievement in conventional tests like the 'O' or 'A' Levels does not automatically mean success in life. According to him "increasing what will count more than analytical intelligence is creativity and practical intelligence." The local education system and its gauges for measuring successful learning should reflect what Prof Stemberg describes as the learner's "ability to grasp, understand and solve real-life problems in the everyday struggle of life". This move would be crucial to Singapore's continued growth and success.

The current assessment practices and measurements of intelligence are unhealthy ones in which students succeed by swotting for a few weeks before exams, at the expense of all aspects of a normal life. Students appearing for streaming and exit exams give up most of their breaks and holidays to attend supplementary and remedial classes. Private tuition and commercially prepared assessment resources have become a mainstay. Such phenomena lead anyone to question the very foundations on which the education system functions. How is curriculum time spent if so much work has to be done outside it? Why can't what is done during remedial and supplementary classes be done in the classroom? Why is there so much dependence on external agencies like tutorial schools when children are sent to school?

Not all students can have access to tuition sessions or assessment books. Added pressure is placed on parents to try and provide these by taking on extra jobs or making sacrifices in their own lives which in turn adversely affect the quality of family life. There are many who put themselves through the same pressures but fail their one chance at making it. Is the rising percentage of O-and A-level distinctions each year a clear symbol of a nation of successful achievers or of a first-rate education system? Education Minister Teo Chee Hean had said that the main aim of education in Singapore is to develop balanced, thinking individuals throughout the years. As a Learning Nation, it is necessary to create more comprehensive ways of gauging levels of learning, understanding and knowledge among all learners.

At the opening of the Education 2000 Conference held in April, the Education Minister said that the focus of education should change, and traditional forms of the teaching and learning process also need to be renewed. The Minister has pledged to "look into cultivating sound management practices among policymakers and practitioners in education to ensure that it is always accessible and affordable" (The Straits Times, 8 April 2000).

1.5 Encourage Holistic Assessment

There has to be a paradigm shift from assessing children using high-stakes exams performances to a more holistic one that takes into account their mental, social, emotional development and any other latent talents. Engendering creative and critical thinking skills can only be successful if and when existing testing and assessment systems are drastically modified or abolished. Significant developments in psychology and brain research have made available models such as Howard Gardner's Multiple Intelligences to provide alternate and more holistic assessing modes.

Students showing talent in non-academic areas such as music, dance, debating, poetry or art will be able to take pride in contributing to how well their school has fared in an SDI-based evaluation system. The education system

can then truly fulfil its aim of developing wholesome, well-adjusted, confident young adults with the right balance of cognitive, affective, physical and psychological characteristics that would help them develop their talents in a global economy. A change in the assessment methods can help to give students time to spend with their families, pursue leisure activities or be involved in community work.

1.6 Creative and Critical Thinking (FGM)

The need for critical and creative thinking skills has been identified as integral for functioning within the knowledge-based economy model towards which Singapore is heading. Participants recognised this, but felt that the policies by which these "new skills" were being infused into education leave much to be desired.

A consensus has not yet been arrived at on the basic definition of the concepts involved or of measuring tools. The debate continues as to whether creativity can even be taught in our schools without first changing many of the ingrained pedagogical practices that run counter to it.

Further discrepancies are created by the continued existence and importance placed on "traditional" modes of assessment based essentially on rote learning and obtaining narrow target answers.

2 STREAMING

2.1 Streaming

An overwhelming majority of the participants' responses reflect anxiety about the streaming exercises practised in Singapore schools. It seems difficult for parents to fathom how a battery of standard exams can serve as reliable benchmarks to evaluate their children at such early stages.

They point out that within an average span of 10 years of schooling, Singapore students are streamed at least four times: in Primary 3, Primary 4, PSLE and Secondary 2. Within the span of their primary and secondary education, they can find themselves in any one of the following streams: Gifted, EMI to EM3, Special/Express/Normal, Normal Academic/Normal Technical, Express, Pure Science/Semi-Science/Arts/Commerce, Junior College/Pre-U/ITE. Parents appreciate the fact that streaming is essentially meant to enable students of varying ability to learn at a different pace. Participants are worried that it serves as an instrument to divide and disintegrate.

This feedback from the parents brings to mind what the principal of premier Raffles Girls' Secondary, Ms. C. Lim, said in an interview with the media. She categorically states that streaming and ranking of schools result in "an overemphasis on academic results" among schools, parents and students, and this is done "often-at the expense of other aspects of student development", (The Straits Times, 22 Oct 1999). She points out how Literature, "which can teach students so much" is "a casualty" of the ranking system since students do not offer it for fear of not scoring in the exam. Literature is one subject that can go a long way towards fulfilling the DOE pertaining to potential leaders who are to "have compassion towards others" and to "be able to inspire, motivate and draw

out the best from others". The question of what type of future leaders are to be groomed within an education system which exposes them to compartmentalisation, segregation, marginalisation and isolation by the time they are nine years old is a worrisome one.

Many teachers and parent participants expressed the belief that streaming reduces the chances for late, different or full development. Young students put into a less than desirable stream can carry the stigma into their academic, professional and social life. Children subjected to the demands and expectations of streaming are not mature enough to understand or deal with them, so it is unfair to determine their future based on their exam performance. The children's sense of self-worth is threatened, their parents disheartened, upset and angry and the teachers defensive. As a result, teachers and parents often unwittingly adopt the language of streaming policy for negative purposes, e.g. "He's a normal student", "She's in the last ten", "What else you expect from Normal class?" "If you don't work hard, you go into Normal". Ultimately, parents bear the brunt of giving their children second chances to pick up where the schools leave off.

Some participants feel that streaming according to national or exit exam résults serves only an economic purpose in society at the expense of values. Some see the practice as a form of social engineering that does not give equal opportunity to less able students. "It does not honour the Singapore pledge and meritocracy becomes a farce", write some parents. Children of parents with the time and resources succeed better, not the others.

Streaming and ranking generate unhealthy competition among children and adults, not the collaboration essential for Singapore's survival.

2.2 Streaming and ranking (FGM)

There is a general consensus within the participants' feedback that the main goal of education should be the nurturing of "the whole child", as advocated in the DOE document. However, restraining and inflexible practices within the system serve to enforce sharp dividing lines at several points of child's education. The less desirable, often unintended results of ranking schools are becoming obvious. Channelling children into different streams based on exit exam grades do little to help individuals "believe in their own ability" or to "possess a broad-based foundation for further education", as mooted in the DOE document. These streaming exercises inadvertently marginalise and segregate significant numbers of children at the very start of their education. It then goes on to have far-reaching consequences for them as individuals and the society as a whole.

2.3 Labels (FGM)

Labelling contributes to the children, their parents and the teachers exhibiting unhealthy levels of competition and selfishness, a far cry from one of the Desired Objectives of Education that encourages students "to be able to share and put others-first".

The majority of schools are labelled "neighbourhood schools". This classification, as a journalist from The Straits Times points out, has "taken on pejorative overtones" and threatens to create a "social divide" (29 Aug 1998) in a society that relies on cohesion. If current practices are measured against the

DOE, they fall short of contributing towards 'achieving the outcomes that we desire'. In some instances, they run counter to them.

Those labels cause anxiety and prompt a preoccupation with competitive success to avoid being given a derogatory label.

2.4 Alternatives to Streaming and Ranking

Any form of labelling is abhorrent to a holistic approach to education. We believe that labelling is inherent to streaming and ranking as these are currently practised.

MOE officials repeatedly cite the importance of streaming in Singapore's continued economic growth. Singaporeans understand the importance of maintaining the competitive edge to continue to grow in a global economy. However, the refusal to acknowledge that modifications can and have to be made to the way streaming is based – solely on one-off exams – has made this issue a controversial and potentially explosive one.

The negative backwash effects of streaming have far-reaching social implications as well. The findings of the PAP Women's Wing study conducted in the mid-1990s highlighted a causal connection between streaming and increased cases of juvenile delinquency. Normal students treated as second class citizens or failures in the education system find dignity, respect and acceptance within anti-social groups outside the classroom.

The practice of channelling and pigeon-holing the young is a significant contributory factor to this as well as the growing numbers of anxiety-related disorders among teachers and students reported in the media.

2.5 Unequal Opportunities (FGM)

Too many resources have been channelled into better and specialised schools e.g. the GEP and the SAP schools.

Participants also observed that the level of economic means of parents denied their children equal opportunities to excel in the current education system. Better-educated parents or those who hold higher-paying jobs are better able to provide personal and external support to ensure that their children perform better in the existing education system. FGM participants noted published data that showed a highly disproportionate number of children from more advantaged backgrounds manage to get admission into the higher institutions of learning. Differing allotment of resources between neighbourhood and independent schools contributes to this disparity. In the former, teachers are often kept so busy just managing the class, that there is little time to give students the individual help or professional counselling that they badly need to benefit fully from the education system.

There has been poaching of good staff to be deployed in these schools to run programmes for a few top-end achievers. This practice serves to demoralise neighbourhood schools. There is also an obvious need to redress the lack of resources for children with special needs and those in pre-school.

2.6 Mother Tongue

There is too much importance given to Mother Tongue and there is an urgent need to lessen emphasis on children's academic proficiency in the subject. Students spend a disproportionate amount of time on it, only to develop an intense distaste for the subject. Participants note that English is the international language vital for Singapore to go on being a major global player, and more time needs to be spent on it. If and when students do not perform well in the Mother Tongue, the negative impact permeates their all-round academic performance. Students who have an above-average competence in all other subjects except Mother Tongue are streamed into classes of less-able peers, stifling their own potential intellectual, social and psychological development.

The worst victims of this policy are the children who have to take a language that is not their mother tongue, and quite understandably fail to get good grades in it. As a result, they and their families suffer long-lasting consequences. There is neither flexibility exercised nor options made available in such cases. Why not take it as an enrichment, not to be used for examination and streaming purposes, participants ask. If tests are set to ensure students take Mother Tongue seriously, just a Pass/Fail grade is sufficient. Participants note that these serious deficiencies in our Mother Tongue policy have been repeatedly brought to the attention of the relevant authorities.

Parents with the financial means are seeking alternatives outside Singapore so that their children's entire future will not be negatively affected by their lack of linguistic competency in the Mother Tongue language. This brain drain of potential local talent and leaders goes diametrically against one of the ideals of the Singapore 21 vision that "every Singaporean matters". Singaporeans given better opportunities to thrive in other countries will do little to ensure that the future generations will "know and believe in Singapore" and are "feeling passionately about Singapore".

3 STUDENT AND TEACHER WORKLOAD

3.1 Multiple Interpretations (FGM)

Another observation made by several participants is that principals, HODs, and teachers have tended to respond differently to the policies launched by MOE. They then acted on their subjective interpretations and perceptions, inevitably resulting in conflicts of ideas, ideals and interests. Teacher participants in particular felt that the crucial player – the principal – has to be "enlightened" in order to implement policies and manage the resulting change in an informed, collaborative, judicious manner. A lack of transparency among the various tiers of authority and parents adds to this problem of variance in interpretation and practices.

An example cited was the MOE announcement that the school syllabus would be cut from 1999 onwards. On the surface, this move seemed a timely and sensitive one in response to the concerns voiced by teachers. The cut in subject content was mooted to give teachers more flexibility and time to incorporate high profile, nation-wide initiatives into existing curriculum already bursting at the seams. On the part of the MOE, curriculum specialists cut the content of some 117 subject syllabi by 10-30 per cent. At the school level, school administrators responded by merely reducing the number of

worksheets and assessment papers that had been scheduled over and above the basic syllabi for a range of subjects.

Teachers found no let up in their workloads as they were hurriedly ushered into endless rounds of training sessions in readiness for the introduction of thinking skills, National education (NE) and Information Technology (IT). All that has been achieved is a net increase in workload.

3.2 Projects and Homework

In an addendum to President S. R. Nathan's address to Parliament in July 1999, the MOE outlined its intention to provide students with opportunities to integrate knowledge, skills and values learnt in class. It proposed to do this by progressively implementing project work in a non-assessment mode in all schools by 2001.

A marked lack of planning, monitoring, analysis and metacognition result in projects that are mere mosaics of photocopied notes. Group members spend much time, effort and money on them only to see their work thrown away at the end of a term. Often the wrong focus is placed on projects which are "beautiful" with little evidence of students being able to "seek, process and apply knowledge". Teachers are at a loss as to how to mark an academic exercise that has no one correct answer supplied to them. Lack of monitoring of group projects leads to uneven amounts of work done by different group members. Unfair or arbitrary grading systems for projects often result in students not being able to "take pride in work, value working with others".

The quantity of homework is in many cases unreasonable, boring and without clear purposes. To cope with the daily homework, parents often feel compelled to provide private tuition for their children. Despite the amount of homework done, it is not reflected in the grades of the students.

3.3 Homework, Projects, Tuition

According to the DOE document, principals and teachers "need the help and support of parents and the community" to do "the best for the children". The demand made by the quantity and quality of homework assignments and projects requiring time outside designated school hours threaten family life. What further aggravates this situation is that inadequate guidance, monitoring, planning, feedback and discussion often accompany homework assignments and projects. In addition, they do not serve a diagnostic, reward nor motivation role in their current form. Teachers, unfamiliar with assessing projects and portfolios, adopt unreliable grading systems. Moreover, many students do not benefit from these exercises because other adults complete them on their behalf.

The widespread reliance on private tuition and the purchase of commercially prepared assessment books are unmistakable signs of the dependence on external agencies and resources to better exam performance.

In fact, trained teachers do not find it unprofessional to suggest to parents that they engage tutors instead of relying on the school to provide the extra help that their children need.

3.4 Modify Time-Tabling

With some minor modifications in time-tabling systems, several positive changes can be brought to the students' and teachers' working environment. With longer periods or block periods, teachers would have time to better meet the physical, emotional and intellectual needs of the students. Having to constantly adjust to different single periods in a day can add to the pressure both for students and teachers already face.

Teachers of different subject areas could co-ordinate the setting of projects so that at any given time only one project is set for the students. No homework should be set for weekends, public holidays or the days before and after a major school event to facilitate time to be spent with families or social events. Besides, students are more likely to stay on homework and projects if they are made enjoyable and interesting. In order to develop the love for learning and success in school in the long term, what Dr. Aline Wong, Senior Minister of State for Education says has to be kept in mind: "A child...needs to learn in fun ways..." (The Straits Times 18 Mar 2000). This maxim applies to learners of all ages.

3.5 Quality of Teaching

Teachers are compelled to focus on rushing through the syllabus to meet the demands of exam specifications and to boost the test scores of their large classes. The big gap between what is taught in class and what is tested creates multiple problems.

Having to cater to an average of 40 students in a class makes any kind of diagnostic work impossible. There is a definite need to reduce class sizes.

3.6 Reduce Class Size (FGM)

It does not take research findings to prove the importance of strong, supportive, interpersonal interaction in the classroom. Both short-term and long-term policies need to be formulated to address and resolve this long-debated issue of the effect of class size and pupil-teacher ratio. Total numbers in classrooms have to be reduced. As a short-term alternative, staff members per class need to be increased. AWARE recognises that there are practical constraints to achieving this due to the shortage of teachers. However, we strongly believe that the objective of reducing class size should be clearly articulated as a desirable policy objective while these constraints are being addressed.

There is enough evidence to show that smaller classes positively impact the quality of education. Stories abound among parents of how one-to-one or small-group tuition sessions with private tutors help their children go from nearfail to distinction grades, and more importantly, develop a better attitude towards learning. Furthermore, studies do show a direct link between the class size and what Ms. Phoon Lee Chaeng, Director of Planning, MOE, describes as "a sense of achievement and motivation to learn" (letter to The Straits Times Forum Page, 29 Mar 2000).

The argument about the relative unimportance of pupil-teacher ratio is not applied when it comes to the Gifted Education Programme (GEP) and Special Assistance Programmes schools (SAP), where class sizes are kept deliberately small. It was the expressed opinion of focus group participants that the SAP (Special Assistance Programme) schools and the Gifted Education Programme (GEP) are examples of the great attention being paid to small groups who already have the resources needed to succeed in any system within or outside Singapore.

4 CHILDREN WITH SPECIAL NEEDS

4.1 Predicament of Children with Special Needs (FGM)

At the FGMs, points raised in relation to children with special needs were as follows:

The school system worked to the detriment of children with special needs because teachers were not sensitised nor trained to recognise and handle such children. This was particularly true in cases where the child's disorder was not obvious and could be mistaken for something else, e.g. attention deficit disorder being mistaken for subnormal educational capability. The system also did not have mechanisms to properly educate and nurture such children once their conditions were diagnosed.

Some parents opined that they had to expend considerable effort to educate the child's teachers and the principal on the nature and management of their child's special needs. This was often frustrating and had to be repeated each year. One example which was cited was that of a school which was given the hardware — in this case a hearing aid system — to aid a hearing-impaired student. However, although the hardware was in place, there was an absence of adequate "software support". The teachers often did not use the equipment and thus did not provide enough support to this child.

Parents also expressed concern over the difficulty of locating a school that would be supportive of their child's needs. Parents were compelled to approach a number of principals, explain the nature of their child's needs to them and risk rejection due to the schools being ill-equipped and unwilling to support children with special needs.

Some parents of children with special needs argued for small schools and the integration of mildly disabled students into mainstream education. This would not only benefit children with special needs but would also benefit the development of the right values and exposure among mainstream students, teachers and parents.

The severely disabled children, on the other hand, require dedicated special schools. ..However, such schools are currently not government-managed but are operated by NGOs. Such schools were felt to be deprived of an adequate level of resources, trained teachers and government support. Natural justice suggests that, as citizens, such children are entitled to a fair share of the resources of the state in seeking an education.

4.2 Support Students with Special Needs

The issue of the neglect suffered by children with special needs surfaced strongly at the AWARE forum and at the FGM held for parents of children with special needs.

Students with special needs who do not qualify for entry in special schools can be severely penalised in mainstream schools. Teachers need to be trained and made sensitive to assimilating these students into mainstream education. Such students can then become active contributing citizens in the future instead of economic dependants or delinquents.

Children who are severely disabled are currently educated outside the mainstream state school system, in schools operated by Voluntary Wolfare Organisations (VWO). Parents are calling for schools for children with special needs to be brought under the direct administration of the MOE and to be given equal status and consideration with

mainstream schools. This would raise the status of these schools and their teachers, leading to a better quality of education.

5 COMMUNICATION AND CONSULTATION

5.1 Increase Transparency

Students are also subject to lack of transparency. The two universities – NTU and NUS – do not reveal how they calculate the entry points for polytechnic graduates into their degree programmes. Parents want to know how the entry points are calculated and urge more flexibility with regard to the institutions' admission criteria and quota system. Such "cloak-and-dagger confidentiality" on the part of the authorities may be partly responsible for the 10,000 to 20,000 who registered for distance learning degree programmes, and the 5,000 others who flocked overseas for a university education in 1999.

5.2 Parent-School Communication

There was a general consensus that parent-teacher communication is lacking and in urgent need of development. Some parents note that school advisory and management boards or ad hoc committees are not truly representative of the majority of the parents in their respective schools and do not actively seek parent feedback. Nothing is done in the way of involving parents when these groups meet. As such, an important avenue to having parents' and their children's concerns aired or feedback given is closed. During designated meet-teacher sessions or talks for parents, teachers and principals focus on the failings and negative aspects of their children's performance at school. Parents feel it is important for teachers to provide a holistic assessment and observation of their child's classroom behaviour. Adequate feedback should include the child's natural talents and abilities, positive aspects of character, psychological and emotional health and the compotence to interact socially.

5.3 Humanising the School Environment

Building mega-schools is a typical example of bureaucratic planning where superficial indicators of efficiency are privileged over real human outcomes. Therefore, the need to humanise schools is much more urgent in the wake of the huge schools and equally massive infrastructures that are being developed in the name of progress in education. Bigger school buildings translate directly into channelling the efforts of administrative and teaching staff, advisory and management committees, students and parents into unwieldy, never-ending fund-raising activities.

The substantial growth in the size or the "hardware" of schools is not matched by the growth of support systems or "software". The latter would help students, teachers and parents adjust to functioning effectively within the glass and concrete school buildings. The top-down, complex bureaucratic systems operating within educational institutions do not take into account the human beings who should be placed solidly at the heart of the human endeavour or educating them.

5.4 Facilitate Parent and Community Involvement

The MOE and schools advocate the importance of parent involvement in all aspects of their children's education. Education is a social process involving other people and external agencies who need to share the responsibility, accountability, rights and obligations it entails. More formal structures are needed for parents and representatives from a broader spectrum of the community and industry to be involved at policy-making levels at the MOE, the National Institute of Education (NIE) and school levels. With separate advisory committees set up in these institutions, feedback can be channelled back and forth between policy-making institutions and all those affected by the implementation and operation of these policies.

5.5 Big Schools

Some parents feel that the trend towards building "mega" schools" is a manifestation of the government's overriding aim of establishing world-class schools in Singapore. These parents perceive the size of these institutions as being "too imposing" and that they have a "dehumanising effect", especially on primary school children. They observe that there is little done to ease young children or adolescents into such imposing environments.

The perception of the principal as the CEO of the school only serves to reinforce this concept of the school as a corporation. Despite their designation as CEOs parents feel that principals needed to be equipped with enlightened management and leadership skills centred on open-mindedness, flexibility and effective interpersonal skills.

6 TEACHER DEVELOPMENT

6.1 Supporting and Developing Teachers

For teachers to be truly effective, their needs have to be recognised and supported.

The retention of good teaching staff cannot be achieved by purely monetary incentives. This has been proven time and time again as each new salary revision has failed to appreciably affect retention rates in the teaching profession. Monetary rewards are a necessary but not sufficient condition of retaining teachers. Experienced and dedicated teachers can just as easily command large numbers of students as private tutors, and the remuneration that comes with it.

Exit interviews by independent agencies would surely reveal the fact that teachers are demoralised, stripped of dignity, made to feel professionally inadequate. They would also say that their opinions are of no consequence. More concerted efforts have to be taken to enhance the working environment of teachers through eliciting feedback from them in non-threatening ways. Better management practices, family-friendly policies, more conducive work stations and environments that promote privacy, relaxation, leisure activities, exercise, communication with peers or students, and reading need to be incorporated into the operating systems of schools.

Teachers have roles other than professional ones and this has to be taken into account when assigning them work that entails working outside school hours and during the holidays.

The cluster system coupled with the ranking of schools has led to elements of elitism developing in the member schools of the cluster.

6.2 Sensitivity to Diversity among Students

Teachers are sometimes insensitive to differences in culture and this leads to discriminating and alienating practices in the classroom. Often these practices are subtle and unconscious. Teachers need to be sensitised to differences in the ethnic features, physical make-up, cultures and value systems of their students.

Even programmes which are instituted for the benefit of students e.g. TAF programmes, inadvertently ignore natural differences and go overboard, resulting in potentially irreparable damage to students' self-esteem and self-confidence.

6.3 Communication between Teachers and Principals

Designated contact time between teachers and principals often degenerates into "talking down" sessions or an opportunity to publicly suppress differing points of view among staff members.

Many teachers argue that principals with continuing classroom experience are the best candidates to empathise with, work collaboratively with and to motivate teachers and students. New duties for principals and the clustering of schools mean the frequent absence of the principals from their schools, called away during school hours to attend to official matters.

Parents are keen to get information on their children's response to particular teaching methods, their learning styles, their level of participation, their emotional makeup and their potential for development. Parents observe that many teachers tack the communication skills, observation strategies or analytical skills to give them meaningful and balanced feedback. They attribute this to time spent on completing subject content, the large class sizes and the principal not giving priority to this area.

Part III- RECOMMENDATIONS

The following Recommendations are submitted in keeping with the Findings of this Report

Recommendation 1 - Progress Indicators

To design new and more holistic indicators of student progress to replace the current over-reliance on quantitative academic results derived from "high-stakes" examinations.

Recommendation 2 - Streaming

To review the current system of streaming in order to introduce alternatives that better serve the goal of equal opportunity.

Recommendation 3 - Student and Teacher Workload

- 3.1 To reduce curricular workload so as to give more time for students to develop their talents in non-academic aspects of their lives and for teachers to engage with students individually and to plan lessons more creatively.
- 3.2 This should be done in conjunction with implementing more family-friendly policies in schools, in the knowledge that a greater degree of personal well-being amongst teachers will have positive spin-off effects on the quality of teaching they render.
- 3.3 Teachers of different subject areas should co-ordinate the setting of projects, so that at any given time, only one project is set for the students. No homework should be set for weekends, public holidays or the days before and after a major school event to facilitate time to be spent with families or for social events.
- 3.4 To make the reduction of class size a medium-to-long-term objective, while in the short term developing teaching assistants to provide support to teachers for more individualised teaching and learning.

Recommendation 4 - Children with Special Needs

- To bring special schools currently administered by VWOs under the MOE. The integration of mildly disabled students into mainstream schools should be continued. The status of teachers of children with special needs should be raised by enhancing their remuneration, training opportunities and career development. More therapists should be attached to mainstream schools to aid in diagnosis and follow-up for children with special needs.
- 4.2 To create multi-disciplinary panels in schools to monitor the progress of children with special needs. These panels should include parents, teachers and therapists/health specialists.

Recommendation 5 - Communication and Consultation

- 5.1 To increase the level of communication within the educational system so that teachers, parents and students are fully apprised of their option.
- 5.2 To create formal and informal mechanisms to ensure that parents and teachers engage in more two-way communication.
- 5.3 To promote adequate representation of parents and community leaders on the advisory committees of schools, so that the interpretation of national policy at the school level is done with the involvement of all stakeholders.
- 5.4 To disseminate information on MOE or external workshops to parents and other interested parties for feedback to facilitate policy-making and policy implementation.

Recommendation 6 - Teacher Development

- 6.1 To include a strong element of cultural sensitivity and diversity awareness in teacher training courses.
- 6.2 To facilitate a greater degree of peer-to-peer networking within the teaching profession.

Part IV - CONCLUSION

Such moves are currently being taken up by governments at regional and international level. Parents and concerned NGOs such as AWARE, would welcome to the opportunity to work in the collaboration with MOE in making the Singapore Education system all that it sets out to be for individuals and the nation as a whole. As Education Minister Rear-Admiral (NS) Teo Chee Hean himself says, the "challenge is to move beyond streaming to an ability-driven system which could better harness the talent in every student". If this can be achieved, then every Singaporean does count.