

China: Revitalizing Education in the 21st Century

ZHANG LI, LIN ZHI-HUA, WANG JIA-QIN, AND WANG MIN

A look back at the 20th century reveals that education provided the momentum for economic growth and social development in both developing and developed countries. Global economic competition is, in a sense, a competition for science and technology, education, and human resources.

In the 21st century, the world faces the challenge of the high-technology revolution. More and more experts think that this century will be dominated by knowledge-based economies, and the most important sources of economic growth will turn out to be the production, processing, dissemination, and application of knowledge as well as information.

In the era of the knowledge-based economy, knowledge is fundamental, talent crucial, and education essential. Education will play a prominent and basic role both in knowledge innovation and human resource development. Only those who control education will possibly survive the fierce worldwide competition.

Revitalizing the Education System

The experience of educational development in China indicates that a high-quality educational system is one of the most important infrastructures and has a particularly strategic role in narrowing the gap between China and developed countries. The government is vigorously carrying out its educational strategy—Vitalizing the Nation through Science and Education (Strategy VNSE). Outstanding developments in education are as follows:

Major efforts have been made in developing elementary education. The government's top

priority in 2000 is to universalize nine-year compulsory education and wipe out illiteracy among the young and middle-aged population. Net enrollment of school-aged children at the primary stage was 99.1% in 1999. Compulsory primary education was implemented in 92% of the country. The gross enrollment rate in junior secondary schools was 88.5%, and nine-year compulsory education implemented in 80% of the country. The illiteracy rate among the young and middle aged is below 5.5%.

Vocational education and adult education have been actively developed. Secondary-level vocational education has advanced dramatically. In 1999, enrollment in secondary vocational and technical schools accounted for 52% of total enrollment at the senior secondary level. Meanwhile, major efforts have been devoted to developing higher vocational education. Adult education is an important part of life-long education. Taking into account that one person can take part in a training course more than once, during the last five years, worker and officer in-service training and continuing education have added up to 210 million "person-times." Farmers have received training 300 million person-times.

Higher education has developed vigorously and steadily. The scale of higher education has

been enlarged under macro adjustment and control. In 1999, 7.19 million students enrolled in the regular and adult higher-education institutions for undergraduate and professional education. The administrative system of higher education has been reformed continuously through joint efforts by the central government and local governments, adjustment in distribution of universities and colleges, cooperation among campuses, and merging of universities and colleges. The total number of universities and colleges has decreased, and enrollment increased by an average of 3,112 students per university. The four universities, for example, have been merged to form Zhejiang University, which has the most number of disciplines and departments in China. The Plan for Reform in Teaching Contents and Curricular System Toward the 21st Century is being drawn up. At the same time, a number of new advanced vocational colleges (at post-secondary level) have been set up. They are run separately by local governments and the private sector.

Great progress has been made in building the educational legal system. Based on existing laws such as the Education Law, the Compulsory Education Law, the Teachers Law, the Regulations on Academic Degrees, and the Law of Protection of Minors, the Higher Education Law was adopted by the National People's Congress in August 1998. In addition, 16 educational administrative laws and regulations, and more than 200 educational administrative rules have been issued. A fundamental legal framework for education is taking shape.

The achievements over the last 20 years have laid a solid foundation for revitalizing the education system in the 21st century. However, China still has a long way to go. The total education level is still low, and the educational structure and system have not kept up with changes in the economic system. Educational philosophy and ideology, curriculums, meth-

odologies, and training models also do not meet the needs of social development. World-class creative talent is especially lacking.

To foster a knowledge-based economy, the government resolved to implement Strategy VNSE and to establish the National Innovation System (NIS). The State Council has already constituted a national lead council on science and education composed of heads of the Ministry of Education (MOE), Ministry of Science and Technology (MOST), and other relevant agencies.

MOE drew up the Action Plan for Vitalizing Education Toward the 21st Century as required by the 1993 Guidelines for Reform and Development of China's Education by 2000. The State Council approved the action plan in January 1999. In June 1999, the central government held a national conference on education and issued The Decision to Deepen Educational Reforms and Advance Quality Education.¹ Reforms will be guided by the following principles:

- Plan holistically.
- Stress key-problem solving.
- Issue guidelines according to type or category of education.
- Accomplish change in steps.

Policies will be adapted to the highly unbalanced conditions among the different regions. Various issues such as development vs. reform, universalization vs. improvement, and popularity vs. emphasis must be handled correctly. The main objectives and tasks within the first 10 years of the century stated in both the Decision to Deepen Educational Reforms and Advance Quality Education and the Action Plan for Vitalizing Education Toward the 21st Century are as follows:

Realize the goal of "Education for All" and continuously promote universalization of education. By 2010, nine-year compulsory education should be universal, and senior secondary education (about 12 years) should be imple-

mented in the urban and developed rural areas. The education period should be close to that in middle-income countries. We should emphasize development of curricular and teaching material at the elementary level, training of teachers in primary and secondary schools, improvement of the quality of teachers, and development of a modern elementary-school curriculum. Comprehensive improvement of elementary education will lay the foundation for improving the quality of overall education.

Build a system for lifelong education. The cultural and technical training system in rural areas, the education system within the modern enterprises, and the system of continuing education for higher education will be perfected in order to train workers and to carry out pre-service and in-service training for them. Retraining will be offered to the unemployed and workers who have shifted to new jobs. In 1999, Internet users numbered 8.9 million; they are expected to increase to more than 10 million in 2000. Personal computer sales are expected to increase by 4 million each year. With the China Education and Research Network (CERNET) and satellite video transmission system as the base, the government will set up a long-distance educational network for continuing education. Traditional audio-visuals, computer-aided instruction, and non-PC NET (such as cable TV) facilities will also be tapped.

Actively promote enrollment in higher education, particularly in advanced vocational education. It is estimated that by 2010 the gross enrollment rate at the tertiary level will surpass 15%. Joint activities and other forms of cooperation among higher educational institutions, independent research institutes, and enterprises must be strengthened. Knowledge innovation and high-technology courses in colleges and universities must be brought to a higher level. Colleges and universities will play

a wider and more energetic role in NIS. They must also attract, keep, and train world-class talent. In 10 years, we will try to push some universities to an international A-level standard, decrease the brain drain, and bridge the knowledge gap between China and developed countries.

Accelerate reform of the educational system. In the next five years, a mechanism will be in place for supplementing schools' state funding with a great variety of other sources, and for jointly developing public and private schools. The government is reforming the administrative system of institutions for higher learning. Under the new administrative system, central and local governments will jointly support higher education, while provincial governments will be the main supporters of schools under the national coordination system. Meanwhile, reforms in the system of student enrollment and graduates' employment and in school management will continue. The technological upgrading of support service in colleges and universities is being realized rapidly.

Increase educational expenditure according to law. The Education Law provides that the ratio of public expenditure on education to GNP must increase progressively. In 1999, the ratio was only 2.55%, much lower than that of other countries. The immediate goal is 4%.

Assessment of Education Results

The government has a national project to improve the technology for assessing the education system. Indicators and methods of gathering information for assessment purposes are being reviewed. A research project was launched in 1996 on Educational Evidence and Indicator System as part of the Six-nation Education Research Project. It is led by the National Center for Education Development Research (NCEDR) with members from other government agencies.² The research examines

ways to assess educational outcomes with reference to international standards and approaches, and determines the kinds of evidence and indicators that would be useful for educational policymaking. In short, the research aims to develop the National Educational Indicators (NEI) system.

NEI will help the government revise education policies and measures. Since the 1980s, education has developed steadily and accomplished much. NEI and the National Educational Management Information System (NEMIS) have been improving greatly. Educational Statistics Investigation Indicators and Educational Evaluation and Monitoring Indicators are gradually becoming standardized. They make available to the public statistical data, which provides basic materials for educational policymaking and supports macro educational research.

In 1984, MOE published the basic statistical data on education for 1949-1981. In the same year, MOE's Department of Planning and Finance published *Achievements of Education in China (Statistics 1949-1983)* in Chinese and English. In 1986, the Department of Planning and Finance of what was then the State Education Commission (SEDC, now MOE) published *Achievements of Education in China (Statistics 1980-1985)* and then *Achievements of Education in China (Statistics 1986-1990)*. In 1988, SEDC began publication of *Educational Statistics Yearbook of China*, which mainly makes public statistical data about schools, students, and teachers, and other information about the structures by level, field of study, locale, and administrative relations. Since 1990, a Chinese-English yearbook has been published annually. At the same time, SEDC published *Educational Expenditure Statistics of China* and *Comprehensive Statistical Yearbook of Chinese Education*. The publications offer supplementary information such as statistics on physical facilities, the national higher education examinations for self-taught students, research and development activities

in regular universities and colleges and school-run enterprises, and so on. NEI data are used for educational policymaking in the following manner:

NEI data help national and local governments conduct research and draw up policies. China is a large country, with a large population and uneven economic development. NEI data show how unbalanced educational development is in coastal areas, and in the central and western areas. The information spurred the national government to make compulsory education universal while allowing different regions to proceed at different speeds.

NEI data help the government formulate its annual education plan, which is based on the previous year's action plan and expenditure. Generally speaking, the speed at which data are gathered is catching up with that of industrialized countries, and is faster than that of developing countries with large populations. The sample survey in 1998 showed that the financial resource (input) and expenditures are used most frequently in seven categories of educational indicators.³ The expenditure indicators are often the priority in making annual plans and medium- or long-term projects.

NEI data are used to monitor the operation of the education system in order to send out warning messages on time when deviations are found, and to improve the multi-agency system of developing education. For example, several sample surveys by the State Statistics Bureau (SSB) since the mid-1990s indicate that the school-age population (12-14 years old) in 2000 will increase by 10%. MOE has asked the local governments to take note of this trend, and to prepare the teachers and schools for the coming changes. The provincial educational commission also found that the qualification rating of teachers in secondary and primary schools is lower compared to the previous year due to inadequate teacher training

in the provinces. The educational commission therefore proposed to provincial governments an urgent measure to improve the quality of teachers. The provincial governments immediately adopted the measure, hastening the standardization of education and of teaching quality.

A 1998 survey indicates that the application of indicators in educational administration and institution management and in monitoring the educational process at various levels is not yet popular. Neither is the educational-indicator system. Only some of the indicators are used frequently, such as those related to educational expenditure, because they are immediately relevant to the schools' survival, and those necessary for monitoring school policy, including qualification of full-time teachers, enrollment rate in primary and secondary schools, annual dropout rate, and size of schools. Other indicators are rarely used because of their vagueness or weakness and should be replaced. All the survey's respondents think that the educational indicators need to be improved. Indicators that reflect educational input and output, for example, should be well designed, definite, and easy to interpret.

Other Applications of National Educational Indicators Data

NEI data provide essential information for and serve the requirements of routine education management and scientific education research. Since the 1990s, every provincial educational department has published local statistical yearbooks or data on education that is more detailed compared to NEI's. They not only play an active role in educational reform and development and in strengthening scientific education management, they also provide basic analytical data for local educational research institutes. The data provide better reference for educational policymaking. A sample survey in 1991 showed that an indicators system exists in most regions. The educational departments

submit annual educational statistics reports to local governments in order to get help in terms of planning, finance, and personnel support.

NEI data, and the publication of educational indicators and statistical data, help improve public understanding of and support for education. MOE uses all possible means to provide educational information service to the public. Aside from publishing statistical yearbooks, it set up and runs the Educational Management Information Center (EMIC), which provides advice and information. The CD-ROM version of *Higher Education in China* was issued in 1997. Since 1998, MOE has maintained a homepage featuring the latest educational statistics. Through a computer network service, MOE and the provincial educational departments issue annual statistical bulletins aside from regular news releases. A 1991-1992 study showed that educational statistical data are most often used in making annual plans by the educational administrative departments at various levels. However, in terms of "mak[ing] the public and parents understand, supervise, cooperate and support education," the use of educational statistical data still has "a long way to go."

NEI data have been used to improve school management and quality of teaching, which is a micro-educational process and therefore of interest to secondary- and primary-school principals and teachers, who pay close attention to school evaluation indicators such as the rates for enrollment, retention, dropping out, repetition, passing the qualifying examination, student promotion, and teacher qualification; and criteria for choosing books and reading materials, experiment equipment, physical facilities, and school buildings. However, the principals and teachers are generally more interested in comparisons of indicators within local areas than in statistical information on the national macro-education situation. A 1998 sampling survey shows that primary- and secondary-school headmasters use the indicators less frequently than do administrative personnel and

researchers, which means that the indicators should be improved.

Comparison between National Educational Indicators and Educational Assessment Indicators

NEI is usually equivalent to the regular educational statistical indicators used in NEMIS at the national and local levels. Educational assessment is gaining importance, as seen in the efforts of the World Bank to help set up a National Assessment System (NAS) in various developing countries since 1990. Educational administrative departments, education research institutes, and schools are trying to use different indicators and methods to assess educational achievements and teaching processes. The experience gained in this area supplements NEI information. The demand for NAS is getting stronger. Table 1 shows the difference between the two sets of indicators.

Compared with NEI, assessment indicators are better in dealing with specific topics, lowering cost, combining quality and quantity assessments, widening the coverage of investigation, and so on. But they have weak points such as insufficient samples and lower comparability with other cases in terms of scope or the years covered. However, assessment indicators and the conventional NEI mutually supplement each other. In China, the main activities in educational assessment are the following.

First, the Education, Science, Culture, and Sanitation Committees of both the National People's Congress and the Chinese People's Political Consultative Conference supervise and inspect compulsory education in different areas, while the Educational Superintendent Office of MOE develops an indicator system for compulsory education based on the existing NEI. The indicator system consists of indicators related to students, teachers, school conditions, and expenditures. It is used to check and supervise the process of making compulsory education universal.

Second, testing and assessing the students' ability and qualifications have great impact because they concern the majority of students. At the end of each semester, 20 million graduates from primary schools take the examination held in cities and counties, 15 million graduates from junior secondary schools take a standard examination held in provinces and cities, and around 2.5 million graduates from senior secondary schools take a standard examination given by provincial and national agencies for entrance to universities and colleges. Testing and assessing are the means to check the students' academic qualifications. Educational administrators use the results and findings to analyze the performance of students with different academic backgrounds and to determine the weakness in the teaching process in order to improve the quality of education. The qualifying examination is a major component of the academic process. It shows the educational progress of the graduates, and helps in placing them for employment.

In recent years, NCEDR and some MOE departments conducted several studies to assess the quality of compulsory education in rural areas. They were assisted by UNICEF, UNESCO, and other international organizations. The National Institute for Educational Studies (NIES) and some provincial educational research institutes carried out foreign-assisted projects to assess pupils' learning achievement at the primary level using International Association for the Evaluation of Educational Achievement methods. However, MOE also developed a set of national criteria for assessing the students' physical condition.

Third, national professional and specialized institutions assess universities and colleges and specialized secondary schools. The Academic Degree Committee of the State Council organizes qualification assessments of special fields of study for doctorate and master's degrees, and of teachers all over the country. MOE is conducting pre-examination assessments of 100 key universities that will be incorporated

<i>Educational statistical indicators</i>	<i>Educational assessment indicators</i>
Emphasize the state of educational institutions; receivers of education; ranks of teachers, staff, and workers; public educational expenditure; facilities; research and development activities in schools; work-study programs and school-run enterprises.	Emphasize teaching quality, professional ability, academic qualification, academic levels, internal and external relationship, factors of intelligence and non-intelligence, management efficiency, human relations, value judgment.
Use numerical or quantitative indicators.	Use quantitative and qualitative indicators.
Whole statistics undergo annual conventional procedure approved by SSB or put on record officially.	Function as an investigation activity that collects sampling data through single (rather than regular annual), time-bound surveys.
Law ensures general investigation of schools and individuals.	Findings (based on sampling survey) have no legal effect and simply treated as indicators.
Data are collected by a permanent network of full-time statistical staff.	Data on specific topics are collected by temporary project teams.
Has higher costs in terms of human, financial, and material resources for data collecting and processing.	Has lower costs in terms of human and financial resources for data collecting and processing.
Collect data for computer database at the national and provincial levels; data processing is aided by PCs, mostly at prefecture and city levels, sometimes at the county level.	Process and analyze data usually by computer, based on survey needs.
Are of lower quality and credibility; may evaluate systematic errors and accidental errors, but cannot easily control them.	Are clear; can easily and systematically control errors.
Have higher comparability of the indicators of one category in different years.	Have lower comparability of the survey in one category in different years and scopes.
Results released in a statistical bulletin annually and published in a statistical yearbook.	Results published in the form of essay, report, and others.

into Project 211, which has been carried out by the central and local governments since 1995. Most of the assessments basically determine universities' academic capacity for scientific research in major special fields of study, the condition of scientific research, and current expenditures. More than 100 indicators for assessing higher education have been selected to set up a new National Database on Regular Universities/Colleges.

Fourth, evaluations of curricular teaching, school management, expenditure, and finance management are conducted frequently. The methods of investigation, discussion and interview, the questionnaire survey, and the methods of practical observation are designed to investigate and analyze the influence of intelligent and non-intelligent factors in the learning process, such as family background, social environment, human relationships, and

value judgment. Some investigations and evaluations borrow from experiences and achievements at home and abroad. They also get support and advice from international institutions and experts. For example, a series of projects for assessing the quality of students in primary school was implemented in Beijing, and the management-by-objective approach was used to regulate and improve the quality of compulsory education in Miluo city, Hunan province.

Great Changes in National Educational Indicators in the Last 20 years

The statistical-indicator system of education used before 1980 had two major weak points. One, it was set up on the basis of the centrally planned economic and education systems, as well as management methods, of the 1950s. Although they were revised from time to time during the 30 years of their use, many of the indicators are out of date and hardly reflect the educational developments that followed the policy reforms and liberalization of China. Two, it emphasized spreading and speeding up the delivery of educational services over large areas, but neglected the improvement of physical facilities of schools. It formulated a system of statistical survey for collecting data but did not develop a system for educational evaluation and monitoring of indicators that show the overall status of education. People used scattered indicators to describe educational results according to their own understanding, which caused differences and confusion.

The existing education indicator system began to be evaluated and revised in the 1980s, and became a new system in 1991. The revised NEI system is now better suited to the reform needs of the education system, and the management of educational institutions. It has two new features. One is the expanded survey indicators. To reform school management and the student admission system, statistical indicators for private and vocational schools jointly run by different agencies were expanded and

applied to the whole educational system. Statistical indicators for the new student admission system were expanded and matched with plans for the admission system to universities and colleges. Statistical indicators for physical facilities were expanded to balance the demand between educational development and physical facilities improvement.

The establishment of evaluation and monitoring indicators completes the indicator system. The new NEI system can better reflect, describe, and assess the process of educational development objectively and scientifically. It has been operating for five years. However, the new system has weak indicators in the following areas:

- education quality;
- adult education;
- qualification for nonacademic or non-degree courses;
- educational input and output;
- level of school management;
- effectiveness of expenditures; and
- evaluation and monitoring, which is not comprehensive.

A 1998 sample survey suggested the inclusion of the following statistical indicators:

- school-management structure, especially of private schools, to guide the government in dealing with different types of school management;
- financial investment in education by the various levels of government, to differentiate the shares of educational expenditure by different financial administrations;
- school charges (including fee and tuition) criteria at various types and levels of schools, to help in local education policymaking and explaining the policy to the public;
- admission rate of students, to adjust to the wave of school-age population, change the educational program, reduce the number of schools, improve school facilities, and reduce the number of superfluous teachers;

- directions taken by students after graduation, to classify them as “admitted to a higher school level” or “looking for employment” or “uncertain”;
- physical and arts education, in terms of equipment; painting and music; and health, psychology, and other relevant subjects; and
- pay and working conditions of teachers, such as the annual salary scale and its average compared to that of other industries; average size of teachers’ housing and its ratio to that of other citizens’; the proportion of teachers’ salary in the educational expenditure of schools at various levels, and the changes in such proportion, etc.

Improvement of National Educational Indicators and the Renewal Plan

Despite improvements in the indicator system, it still needs better human resources, technology, and administrative personnel. Some local governments and educational administration departments still give little importance to the creation of an information system on education management.

China is planning to improve the educational-indicator system based on the following considerations. First, the system should suit the changes in educational activities resulting from the transition from the planned economy to the socialist market economy. For example, the employment of graduates will be determined by the labor market, not by the government. Schools will adjust their admission rate and their structure of specialties according to the needs of the labor market. For this reason, it is becoming more and more important to have an overall view of the employment situation of graduates. The Action Plan for Vitalizing Education Toward the 21st Century provides for the “setting up of an integrated information net system for recruiting students, registration management, and employment

information service in universities and colleges all over the country.”

Second, the system should meet the needs of transition in mode of production. The economy has long had serious problems such as high investment and cost and low output, wastage of resources, and low-quality or ineffective education. Indicators should show and measure the efficiency of investment in education. At the same time, they should be highly reliable and valid. The low validity of some indicators is due to design, and some to the great difficulty in operating and controlling them. Low reliability affects their validity. MOE is studying and improving China’s EMIS on the basis of a new international standard classification in education under the educational statistics indicator system of UNESCO and the Organisation for Economic Co-operation and Development.

Third, the system should suit the demands of international comparative research. Progress in science and technology has reduced the distance between peoples and places. The Internet has made possible the direct transmission of messages between and among countries. Narrowing the difference of education indicators between China and foreign countries will benefit educational managers and researchers all over the world. MOE has set up CERNET, linked with more than 100 universities through the Internet. Small internal networks have been developed in various agencies. Now MOE is establishing an internal EMIS network within educational departments and agencies. (Please visit <http://www.moe.edu.cn> or <http://www.cernet.cn>.)

Fourth, the system should meet the needs of evaluating educational quality and implementing quality-oriented education. By 2000, nine-year compulsory education will be universalized. To guarantee and improve educational quality is a major problem in basic education. Thus, more and more attention is paid to indicators of quality education. The central

government's decision focused on advancing high-quality education in the 21st century.

Fifth, it should meet the needs of monitoring educational planning. Implementation of the plan for 2000 is nearing completion. The long-term plan for 2010 has been designed. Whether or not the current status of education meets the requirements of the plan, the monitoring system has become an important project and been put on the agenda. Generally speaking, there are favorable trends for research and experiment on NEI. The educational administrative departments and the schools emphasize the establishment of a scientific NEI. The educational quality, including the quality of learning achievement, and the conditions of schools, student groups, school management, and so on, are the key points that should be integrated in the statistics reporting of existing systems such as EMIS, the superintendent system, the examination system, the teaching-learning assessment system, and the system evaluating school conditions and internal management. The new NEI system, with educational quality as its core content, should be operationally useful and diversified, and relevant to the characteristics and status of various regions.

Teaching Human Rights in Schools

Human rights education in Chinese schools mainly takes the form of legal education. It is not only part of socio-legal education, it is also a major component of moral education. It is an important means of teaching students about socialist democracy and the legal system, and of achieving the rule of law. It is therefore a crucial link in the cause of human rights.

The government attaches great importance to legal and human rights education for 320 million students each year. Article 24 of the Constitution makes it the responsibility of the state to provide legal and human rights education. Article 6 of the Education Law mandates the state to provide legal education. Article 3

of the Law on the Protection of Minors; Articles 4, 6, and 9 of the Law on the Prevention of Juvenile Delinquency; and other education laws lay down special regulations on legal and human rights education in schools.

According to the national syllabus, all schools should offer courses on legal education, or incorporate contents of legal education into relevant courses, and employ full-time or part-time teachers for legal education. Schools are also encouraged to employ after-class tutors. Education programs should be result-oriented by taking into account the age of students and by including the basic legal knowledge closely related to their daily life. At the same time, primary schools and middle schools should offer moral education courses that also teach human rights. The state formulates teaching plans, sets curriculum criteria, compiles textbooks, and assigns full-time teachers.

The state requires that teachers engaged in human rights education at all levels should study the Constitution and have basic knowledge of laws to enhance their own legal awareness and set an example for students. Legal education is a core course for the in-service training of teachers. In order to build a stronger team, schools adopt various approaches to provide systematic legal training for teachers, such as pre-service, in-service, and full-time training. In order to advance human rights studies and expand international exchanges, many universities and colleges have set up relevant research institutions. They also carry out human rights education and research by holding direct talks with other countries. Human rights education institutions in some universities in Beijing conduct wide-ranging exchanges with human rights institutions abroad. The participating teachers bring back useful information and incorporate them into their teaching materials, eventually raising the level of human rights education in universities.

The government's Decision to Deepen Educational Reforms and Advance Quality Edu-

cation and the Action Plan for Vitalizing Education Toward the 21st Century require schools, universities and colleges, educational administrators, and other concerned sectors to emphasize moral and legal education. Government agencies and research institutes have developed a series of legal, moral, and human rights education materials for schools and the general public. For example, they have published *Textbook on Human Rights of Citizens in China* and numerous reference books and monographs on human rights education.

This year, cases of violence committed by minors have shaken China. Underaged criminals often know little about law and morality, and often suffer from too much school work and pressure from their parents and classmates. Meanwhile, many high-achieving students, especially in rural areas or towns, do not know how they can legally protect themselves. Legal, moral, and human rights education on campuses have thus recently received more attention than in the past.

School headmasters and teachers are asked to use and develop various assessment methods to determine the impact of legal, moral, and human rights education, and to evaluate behaviors in the education process. They are required to help students solve different problems (learning and psychological) and to coordinate with parents and the local community, under the guidance of educational researchers and administrators. MOE is preparing guidelines for inspecting quality-oriented

education and for assessing the patterns of legal and moral education.

Notes

1. There has been a protracted discussion on quality of education, especially at the elementary stage. The very rigid examination system and heavy learning load are not suitable for children. More and more students, parents, communities, and governments want to develop a new high-quality education system. A more flexible and diversified education system will encourage young people to develop holistically.

2. The Six-nation Education Research Project has been conducted jointly since 1993 by several research institutes from China, Germany, Japan, Singapore, Switzerland, and the United States. The National Center for Education Development Research coordinates the sub-project on Educational Indicators with Singapore and the United States. More than 10 experts from the Department of Planning, the Educational Management Information Center, and the Department of International Cooperation of the Ministry of Education, the National Institute of Education Research, and the Department of Social Development of the State Statistics Bureau take part in the project in China.

3. Seven educational statistics indicators are adopted under the National Educational Indicators system: input, capital construction, expenditure, staff, teachers, school-age population, and average educational attainment. The indicators are drawn from the standards of statistical indicators of UNESCO and the Organisation for Economic Co-operation and Development.