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The Educational System of Brazil

An Update of Current Reforms

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razil is immense. This fifth largest country in the world could easily contain all of Europe within its borders and is larger than the contiguous 48 states of the United States as well. Although Brazil's population of an estimated 153,367,841 is both racially and ethnically heterogeneous, its society reflects traditional Portu-

guese cultural values. Portuguese is the official language, and Roman Catholicism is the predominant religion.

Sprawling over the eastern half of South America, Brazil is a land of considerable contrasts in population density and wealth. The 1.5 million square mile Amazon basin in the north is sparsely populated and only now being developed. The arid northeast is poor and crowded, while the affluent south and southeast regions have the most resources, almost half the population and produce three-fourths of all farm goods and 80 percent of the industrial output. The capital city of Brasilia was created in splendid isolation 600 miles inland in 1960 in order to redistribute the population to the plains and toward the Andes to the west. An estimated 70 percent of the population continues to live in urban areas hugging the 4,000-mile Atlantic coastline.

It is generally recognized that the first European to reach Brazil was a Portuguese navigator named Pedro Alvares Cabral in the year 1500. He found a vast country sparsely settled by about 2.5 million Tupi and Guäränï Indians. Responding to attempts by the French, Dutch and English to establish footholds in Brazil, the Portuguese king in 1534 made a bold move to colonize his territory by creating 15 capitanias (captaincies) there. Each commission was granted a fazenda (plantation), ranging in size from 20 to 50 square miles, for which the recipient promised to finance settlements in return for wide governing powers and potential profits. Thus was born the tradi-



tion of extended patriarchal families controlling the land, commerce and local bureaucracy--an oligarchy which has persted and created so many of Brazil's contemporary problems. These landowners needed slaves to cultivate their huge holdings. When they met resistance from the church in pressing Indians into servitude, they began importing African slaves, eventually bringing over 3.5 million blacks before slavery finally was abolished in the late 19th century.

In 1549 Jesuits arrived, established church schools and went about the work of assimilating the indigenous population into the Portuguese culture, conquering Brazil spiritually, as it was said. During their 200-year stay, Jesuits clashed repeatedly with landowners over treatment of the Indians; the Order finally was banished from Brazil in 1759 by a disgruntled Governor-General, leaving the country without an effective education system for the next 50 years.

The King of Portugal temporarily moved his seat of government to Brazil in 1808 in order to escape Napoleon's army,

and quickly founded the Naval Academy (1808) and a Military Academy (1810) for purposes of defense of his colony. The education system set in place during this period was based on the French model. After Dom Joao VI returned to Portugal, two of his descendants ruled successively as "emperors" of Brazil until the last was deposed in 1889 and the republic proclaimed. Years of almost uninterrupted military rule followed. Democratic elections held in 1985 voted in civilian rule, which continues.

The current population reflects Portugal's colonial policies of assimilation of the Indians and the encouragement of immigrant labor after slavery was abolished. Intermarriage with blacks also was so common that many people classified as "white" would be considered mulattos in another culture. The breakdown is about 56 percent white (mainly Portuguese, some Italians and Germans); 37 percent mixed European-African-Indian; 5.6 percent black; and .6 percent Japanese and Middle Easterners. Fewer than 100,000 pure-blooded Indians sur-

vive. Those who did not assimilate were driven further and further into the interior, where many were massacred.

Brazil is organized as a federative republic with 26 states and a federal district.

Endowed with vast mineral resources. agricultural advantages and a huge labor force, Brazil soared to industrial preeminence in Latin America in the period from 1968-74 when the Gross National Product averaged 10 percent growth annually. An "economic miracle" was proclaimed. Oil price increases in 1974 brought this spectacular growth to an abrupt end, followed by economic recession and hyperinflation, which peaked at 84 percent a month in early 1990 before being brought under tenuous control through austerity measures. Budget deficits have long been a way of life in Brazil. The government historically has fueled inflation by printing mountains of cruzeiros to meet expenses. Brazil is now burdened with one of the largest foreign debts in the world of \$115 billion, and suspended interest payments on this debt in 1987.

PROBLEMS OF THE MODERN EDUCATIONAL SYSTEM

Great inequities
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The Imperial Constitution of 1824 stated "primary instruction should be guaranteed without onus, for all." In practice, education remained reserved for the elite. After World War II when educational opportunities expanded rapidly in most developed nations elsewhere, Brazilian education remained characterized by high levels of illiteracy, poor school attendance, a debilitated urban school system and virtually nonexistent educational opportunities in rural areas.

In the turbulent 1960s Brazil was affected by student protests demanding reform in the social structure as manifested by the limited educational opportunities. Responding to these demands, the government in 1971 reformulated primary and secondary levels of education. Education became viewed as an investment. The so-called "economic miracle" of the early 1970s, with its high rates of growth that pointed toward prosperity,

appeared to give credence to the educational theses then in vogue.

The 1971 reforms did not lead to the qualitative improvement of the educational system, however. Enforcement of compulsory attendance in schools has proven impossible because of the continued isolation of many areas and a large migratory population. Great inequities remain in the quality of education among the regions and among different social classes, exacerbated by current economic problems. How to address these inequities remains a continuing controversy.

The government has had some success in combatting illiteracy. Between 1950 and 1980 the percentage of illiterates between the ages of 15 and 39 fell from 50 percent to 25 percent. From 1980 to 1988, the real decline in that age group was from 18.2 to 14 million illiterates.

Public education is free at all levels.

ENROLLMENT AT EACH EDUCATIONAL LEVEL

The population receiving education at each level of instruction is indicated in these 1988 statistics:

REGION

LEVEL OF INSTRUCTION

	Primary	Secondary	Higher
North	2,020,407	142,569	40, 989
Northeast	8,304,302	804,552	251,248
Southeast	10, 602,323	1, 636,244	813,097
South	3,781,908	528,177	291,987
Central-West	2,112,194	223,388	85,000
Total	26,821,134	3,334,930	1,482,321

Source: Ministry of Education (MEC)/SG/SEPLAN/SEEC

PRE-SCHOOL EDUCATION

In Brazil only 15 percent of the 26 million children aged 6 years or younger attend pre-school. Of these, 66 percent are between five and six years old. Public

pre-school education is the responsibility of the states and municipalities, but is not mandatory. The 1988 Constitution requires the government to give assistance to children up to six years of age but this is manifested mainly in nutritional, immunization and other social welfare programs.

PRIMARY EDUCATION (PRIMEIRO GRAU)

Prior to 1971 primary education consisted of four grades. Law #5692 in 1971 extended primary education to 8 years or grades (séries) and made education compulsory for 8 years from age 7. However, a large percentage of primary schools still offer instruction for only four years. In 1986, of the 178,070 registered primary schools, 114,194, or 64 percent, offered instruction only until the 4th grade. This phenomenon is more common in rural areas.

The correlation between problems in the primary educational system--particularly absenteeism and repetition of grades--and Brazil's social system is very evident. Education in rural areas suffers by comparison with urban centers. Rural education is often marked by a shortage of schools or inferior facilities which may

consist of one-room schools for all grades, and a long tradition of inadequately trained teachers. At primary level about 14 percent of teachers have little or incomplete training. They are called "lay teachers," and most work in rural areas. The percentage of lay teachers is 34 percent in the north and 30 percent in the north-east.

Children in rural areas attend school on average for only two years, with the exception of the South and Southeast, where average attendance is 3.6 years. Many of these children leave school after having failed or they enter the informal job market at an early age to help their families.

Since 1985 there has been a notable increase in the availability of primary instruction, demonstrated by the fact that

entrance into the first grade of primary school now is almost universal. However, school enrollment for the population aged 7-14 is only about 83 percent, signifying that about 4.5 million children in this age group do not continue in school. Absenteeism is highest in the northeast, where half of the school absences occur; in the suburbs of large urban centers; and in regions of large migratory flux, such as the new agricultural frontiers of the north and central-west.

Because of the uneven quality of public schools at the primary and secondary levels, those families who can afford to do so send their children to private schools, which generally offer a good standard of education.

PRIMARY LEVEL ATTRITION PERCENTAGE BY GRADE

Grade 1 2 3 4 5 6 7 8 Attrition Rate 27 18 14 11 11 8 6 5

Source: Ministry of Education (MEC)SG/SEPLAN/SEEC

External factors which contribute to these high dropout rates include malnutrition, the abandonment of children by their families, and late entry into school. (It is estimated that there are five million children in Brazil without parents or any form of family. Abandonment is widespread both in the countryside and urban areas.) Internal factors include the failure of schools to provide good learning

environments through proper facilities and qualified teachers.

At the primary stage the federal government plays a small role in the level of instruction. The Constitution states, in Article 211, Section I, that "The Union will organize and finance the federal system of education and the education in the territories, and will give technical and financial assistance to the states, Federal

District and municipalities for the development of their system of education and give primary attention to compulsory school attendance."

Out of a total primary enrollment of 26,821,134 in federal, state, municipal and private schools in 1988, only 134,106 were enrolled in federal schools.

PRIMARY LEVEL CURRICULUM -

State governments decide the curriculum at all levels. The minimum (minimo) curriculum for primary education, as well as secondary level education, provides for common core subjects for all students in all schools in the country. The full (pleno) curriculum includes certain compulsory subjects, and allows for additional courses to satisfy local needs

and individual differences.

The common core subjects (basic knowledge) for *primeiro grau* as well as segundo grau are broadly defined as "Lingua Portuguesa (Portuguese language), social studies and sciences." Within these general headings are study of geography, history, social and political organization of Brazil, mathematics,

and the physical and biological sciences. A pleno curriculum will also include the compulsory subjects "moral and civic education, physical education, art education and health programs."

Completion of primeiro grau leads to the certificado (certificate), which has no particular title and for which no examination is required.

SECONDARY EDUCATION (SEGUNDO GRAU)

Secondary education, called segundo grau (second level), includes three or four series (grades). In 1988 only about 12 percent of the population aged 15 to 19, or 3,339,930 students, was enrolled in segundo grau. The attrition rate is high, and it is a major achievement for a student to complete secondary school.

Pre-1971 ----

Prior to 1971 secondary education was divided into a lower cycle (ciclo ginásial), consisting of grades 5-8, and an

upper cycle (ciclo colégial) of an additional three or four grades. Students followed one of five tracks: academic, normal (pedagogic), agricultural, industrial or commercial, and had to pass a selective examination to enter secondary school after grade 4.

Post-1971 ———

Law #5692 of 1971 reorganized secondary education into one level beginning at grade 9, eliminated the entrance examination and provided for compulsory technical training in commercial, agricultural or industrial areas in addition to general education. The new curriculum was designed to provide all students with a common educational experience which would enable them to either enter the job market, pursue further technical or professional training, or enter higher education.

The scholastic year at secondary level has a minimum of 180 days divided into two equal parts. Students usually have four hours of classes each day.



REQUIREMENTS FOR CERTIFICATES AND DIPLOMAS AWARDED AT SECONDARY LEVEL FROM 1971-82

From 1971-82, secondary programs included a compulsory element of technical or professional training called "habilitação," reflected in prescribed hours of special training courses. Five types of certificates or diplomas are awarded upon completion of Segundo Grau:

- 1 Certificado de Conclusão de 2º Grau (Certificate of Conclusion of Second Level): a minimum of 2,200 hours which included 900-1200 hours of special training courses called formação especial, and allowed the student to either sit for university entrance examinations or continue professional training leading to the Diploma de Ténico de 2º Grau;
- 2 Certificado de Habilitação Básica (Certificate of Basic Professional Qualifications): a minimum of 2,250 hours which included 1,050 hours of special training courses (formação especial). This qualification gave a broad professional background rather than specific technical training, and allowed the student to either sit for university entrance examinations, enter the job market or undertake further professional training leading to the Diploma de Técnico de 2° Grau;
- 3 Certificado de Auxiliar Ténico (Certificate of Technical Assistant): a minimum of 2,200 hours, of which 300 were spent in special training courses (formação especial) and allowed the student to either sit for university entrance examinations, enter the job market or take further professional training leading to a Diploma de Técnico de 2° Grau;
- 4 Diploma de Técnico de 2º Grau (Diploma of Technician of the Second Level): from 2,200 to 2,900 hours, including 900-1,200 hours of special training courses (formação especial) and on-the-job training. The diploma allowed graduates to either sit for university entrance examinations or enter the job market with intensive training related to a particular skill;
- 5 Diploma de Professor do Ensino de 1º Grau (Diploma of Instruction of the First Level): 2,200-2,900 hours, including 122 hours spent in special training courses (formação especial). This is a teaching qualification.

GRADING SCALES

Grading scales at secondary level range from 1 to 10, with 5 a passing grade.

1982 Reforms

It became generally recognized that programs intended to transform the millions of students at secondary level into skilled workers ready to step into the work force were a failure. Law #7044 of 1982 de-emphasized the habilitação portion of secondary education, renewed emphasis on academic subjects and technical education, and granted school autonomy over curriculum development and more student freedom to select subjects. Further, the teaching year was reorganized into two

semesters for greater flexibility in course selection.

Failure of habilitação occurred because there was not enough public money for the facilities (machine shops, office equipment or laboratories), skilled teaching staffs and new training materials needed by each school to implement these ambitious training programs. Although the emphasis has changed, names of the certificates and diplomas awarded have remained the same.

PROBLEMS OF SECONDARY LEVEL EDUCATION

The Constitution of 1988 called for the "progressive extension of mandatory and free education," recognizing that public education fell far short of demand. Nearly 1.5 million students in 1988 paid to attend private schools at secondary level, either because places in public schools were unavailable or because the education of-

fered was so inadequate.

As in primary education, there is a lack of qualified teachers at secondary level. In 1985, 26 percent of teachers were not legally registered to teach because they had not completed all requirements leading to a professional license for secondary level teaching.

The problems which students encounter at the primary level continue at the secondary level. Many students must repeat various courses in secondary schools, resulting in a high percentage of students who are too old for their grade level.

HIGHER EDUCATION

HISTORY OF HIGHER EDUCATION INSTITUTIONS

When the king of Portugal settled his court in Brazil in 1808, he also set up schools of medicine, law, and mines based on the Napoleonic model of the grandes écoles. Prestigious professional schools for the elite of the country were the only form of higher education until the 1920s. Children of wealthy families who wanted a university experience travelled to Europe, especially France, for their tertiary education.

The University of Rio de Janeiro was founded in 1920 by combining separate schools of law, medicine and engineering. Seven years later the Federal University of Minas Gerais was similarly established.

Law #5540 of 1968 called for massive expansion of the tertiary system in order to prepare "human resources" who would contribute to the rapid economic development of the country. The goal was to provide places for at least half the graduates of secondary schools. The government, however, while eager to increase the country's skilled work force, was reluctant to expand the public sector of higher education because of the high costs involved. The number of private institutions sprouted tremendously to fill the need. Charging high fees, offering student-to-faculty ratios more than double those of public schools, as well as fewer well-trained faculty members, private institutions at tertiary level in general have much poorer academic reputations than do public institutions. Some exceptions exist. Yet, for those students who cannot gain entry to the few places offered at free public universities, private institutions are the answer. Undergraduate enrollments leaped from 142,000 in 1964 to 1,408,000 by 1984. Even so, only slightly more than 11 percent of the population between the ages of 20-24 enters higher education and the dropout rate is high. Only a small minority of the population actually earns a degree.

PROBLEMS OF HIGHER EDUCATION

The measures adopted in 1968 for reform of higher education had a wideranging effect and long-term repercussions, particularly in regard to expanding the system. The higher education system that prevails today has the follow-

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ing characteristics:

- 1. the predominance of escolas isoladas (see below) over university-type institutions;
- 2. great numbers of private institutions operating without adequate government supervision;
- 3. a significant increase in maintenance costs at public universities which makes the Brazilian student one of the most expensive students in the world; and
- 4. a decline in the quality of teaching and a lack of qualified professors to fill all positions created at the beginning of the expansion process.

A recent scandal has made it clear that private institutions make almost no effort to verify credentials of transferees. Although the Education Ministry has vowed closer supervision of private institutions, drastic cuts in funding for education make stringent controls unlikely.

The autonomy of universities was recognized in the 1960s and reaffirmed in the 1988 Constitution. Yet, the dependence of public universities on government funding gives them little real power. The government's deep budget cuts in Brazil's recent years of economic hardship have led to repeated public university closings by protest strikes of several months' duration by both faculty and administrators. University officials say they are starved for funds for the basic facilities needed to carry on their teaching. In May, 1990, as part of a sweeping new austerity drive, federal universities were ordered to dismiss 25.5 percent of their employees or reduce their payrolls by 30 percent in some other manner. Typically, most institutions were overstaffed.

PROCEDURES FOR RECOGNITION

In order to function, both public and private institutions first must request *autorização* (authorization) from the Federal Council of Education (CFE) which

establishes conditions. Authorization is conceded by the Minister of Education. After a minimum of two years of operation, an institution must call for reconhe-

cimento (recognition). The institution is then examined by the Federal Council and if approved, is given recognition by the Minister of Education.



Brazil continued...

ENTRANCE REQUIREMENTS .

Access to higher education requires completion of segundo grau and success in the vestibular, an entrance examination broadly regulated by the federal government, but designed and administered by each institution. Candidates for entrance may sit for the examination at more than one institution during the vestibular testing period. In 1988 the Minister of Education determined that failure in the Portuguese language would constitute failure in the vestibular. The results proved

that many applicants were semi-literate. Even with the limited number of places available at these institutions, public universities were left with a record number of vacancies when thousands of students taking the *vestibular* failed to qualify for admission—a result of their substandard primary and secondary education.

Repeated overtures by the government to replace the *vestibular* with a less rigorous entrance examination in order to fill all places available at public institutions have been met with resistance by the academic community, particularly at such institutions as the University of São Paulo and federal universities in general.

The difficulties encountered in passing the *vestibular* have created a new paraeducation industry--the *cursinhos* (little courses), cram courses which are offered for as long as a year, usually by private schools, to students preparing for the *vestibular*.

TYPES OF INSTITUTIONS OF HIGHER EDUCATION

Source: MEC/SG/SEPLAN/SEEC

Higher education in Brazil is offered at universities, escolas isoladas (isolated schools), and federações de escolas (federations of schools), any of which may be either public or private.

Universities consist of centers, such as Health, Languages, the Arts, etc. Each center, in turn, consists of different insti-

tutes/faculties, and each institute/faculty contains departments. Universities are charged with providing service to the community, which is manifested in ways such as the offering of extension courses.

Escolas isoladas, the predominant type of higher education institution, are institutions offering one field of study.

Federações de escolas are simply associations of various schools, which formerly were escolas isoladas.

Mobility between institutions of higher education depends on the availability of places. It is very difficult to move from a private institution to a public one.

HIGHER EDUCATION INSTITUTIONS BY TYPE AND ADMINISTRATIVE CONTROL, 1988

Control	Universities	Isolated Schools	Total
Federal	35	19	54
State	15	72	88
Municipal	3	90	93
Private	31	607	638
Totals:	84	788	873

The following table shows that in 1988, the private sector had more than 61 percent of the total student enrollment; 48

percent of the students were enrolled in non-university institutions.

By region, the last statistical sum-

mary by the Ministry of Education in 1987 showed that 81 percent of these institutions were located in the south and south-



HIGHER EDUCATION ENROLLMENT BY SCHOOL TYPE AND ADMINISTRATIVE CONTROL, 1988

Administrative	Туре			
Control	Universities	Isolated Schools	Total	
Federal	304,465	13,366	317,831	
State	129,875	60,951	190,736	
Municipal	17,178	59,606	76,784	
Private	318,812	599,397	918,204	
Total	770,330	733,320	1, 503, 650	

Source: Ministry of Education (MEC)/SG/SEPLAN/SEEC

east. The federal government, however, maintains as least one federal university in each state.

Universities follow the calendar year from January to December, with a winter vacation in July and a summer vacation in December.

UNDERGRADUATE DEGREES OFFERED

Courses of study are of three to seven years in length. Students must follow a core curriculum ciclo profissional do cursos de graduação (professional cycle of undergraduate courses) determined by the Federal Council. Study is offered in subjects such as medicine, economics, mathematics, philosophy, literature and engineering. Each curriculum has a certain number of required courses plus electives

in the chosen major. Under the reforms of 1971 each tertiary-level institution had to adopt the semester credit system. Each course carries a fixed number of credits and is completed in one semester. The number of credits per semester carried by a full-time Brazilian student will average between 25-35. Examinations are held at the end of each semester. Each university sets a required minimum and maximum

load that a student may carry each semester. On completion of a full academic course of study, students may obtain the bacharel, licenciatura or a titulo (professional title such as engenheiro [engineer], medico [doctor] or contador [accountant]). The licenciatura is offered only in fields where a student might wish to undertake secondary or tertiary level teaching.

GRADUATE EDUCATION

Graduate education was introduced in Brazil in the early 1960s but little was available until 1968. A large number of courses now are being offered by public institutions, particularly by federal institutions in the southeast region. Graduate education is patterned after the American model. CAPES, the Federal Agency for Higher Education Development, was created to train faculty and researchers as

well as to oversee the implementation and financial support of graduate courses in universities. In order to address regional imbalances, CAPES developed five regional centers for graduate study within existing universities.

In 1985, 37,726 students were enrolled in master's and doctoral programs. The availability of public graduate education is still unsatisfactory considering that 1.5 million students graduate with first degrees. Of these, only 10.42 per 1,000 graduates go on to graduate studies. In Latin America as a whole, the index was 17 per 1,000. In Argentina, it was 39 per 1,000; in Cuba, 23 per 1,000; in Venezuela, 22 per 1,000 and in Mexico, 16 per 1,000. In North America, the indicator was 59 per 1,000.

ENTRANCE REQUIREMENTS

Entrance to graduate programs requires a bacharel, a licenciatura or an equivalent professional title, as well as an

acceptable grade average from undergraduate level. Most areas of study also require an entrance examination, and some pro-

grams require proof of a reading knowledge of a foreign language.

Brazil continued...

GRADUATE DEGREES

Two types of graduate programs are available: sensu stricto (strict sense) programs which lead to the mestrado (master's) and doutorado (doctorate) degrees, and sensu lato (wide sense) programs which lead to a certificate in some professional specialization but are not awarded any graduate credit.

Graduate study is available in subjects such as education, sciences, mathe-

matics, statistics, law, and languages A full-time student must take a minimum of one year to complete the *mestrado*, while a part-time student may take as long as five years. Those seeking a *doutorado* must study for a minimum of an additional two years. Entrance to a *doutorado* program may or may not require completion of the *mestrado* degree, depending upon an individual institution's require-

ments. Either degree requires a specified number of courses, a comprehensive examination and, respectively, a research thesis or dissertation which contributes original research. Although not mandatory, graduate programs may request authorization and recognition by the Federal Council of Education. Only degrees received from recognized programs are legally accepted in Brazil.

TEACHER EDUCATION

Law #5692 of 1971 set minimum standards for teachers of primary and secondary schools:

- To teach in the first four grades of primary school, a fully-qualified teacher must have the *Diploma de Professor do Ensino de 1° Grau*, received at secondary level after a three-year program which requires 180 days of study each year.
- To teach in the upper eight grades of primary school, a teacher can take a program of two or three years' duration at university level to obtain a licenciatura de primeiro grau or licenciatura curta (short licenciature). The latter is not equivalent to the full licenciatura; OR
- To teach in the upper eight grades of primary school (and required to teach at secondary level), a fully-qualified teacher must have the *licenciatura* from a university. This is awarded after completion of a *bacharelado* course in a specific discipline and additional pedagogical in-

struction. The length of both programs varies in accordance with enrollment, i.e., concurrent or sequential.

- To teach at university level, teachers are required to have a *mestrado* degree awarded after a program of variable duration.
- To teach at graduate level, teachers are required to have a *doutorado* degree.

In reality, these requirements are seldom met. In rural areas teachers often have no qualifications at all. Even at university level, particularly in private institutions, many of the faculty are underqualified.

The teaching profession is a hard lot in Brazil. Although there are teachers' organizations, most are on the state level and none, for example, has the clout associated with teachers' unions in the United States. Teaching salaries vary capriciously from region to region and from school to school, sometimes by as much as 400 percent. Most teachers work part-time for several institutions. About 40 percent of teachers nationwide receive below what is classified as a minimum wage, so it is not at all unusual for teachers to have to hold more than one job in order to make a living. This poor remuneration creates a downward spiral in professional standards: the shortage of qualified teachers creates a void which is filled by unqualified people; the widespread lack of professional training, in turn, leads to the degradation of the teaching profession as a viable career.

Further difficulties are created by overcrowding. Classes at primary and elementary level may have as many as 50 students per teacher. Many schools are forced to operate on a shift system, with primary level classes held in the morning, secondary level classes in the afternoon, and evening classes for working students.

GRADING SCALES

Each university has autonomy to determine its own grading scale, and within each university, different departments may use different grading scales. Many institutions still are using the 0-10 scale, with 5 considered a passing grade. Other systems are:

A = 90 - 100 Excelente (excellent)

 $B = 75 - 89 \quad Bom \qquad (good)$

C = 60 - 74 Regular (average)

D = 50-59 Sofrivel (below average)

I = 0 - 49 Insuficiente (fail)

S = Abandono com aproveitamento (withdrew in good standing) OR

A = Excelente (excellent)

B = Medio superior (above average)

C = Medio (average)

D = Medio inferior (below average)

E = Insuficiente (fail)

F = Incomplete (incomplete)

J = Abandono justificado (withdrew in good standing)

OR

A = 8 - 10 Excelente (excellent)

 $B = 6 - 7.9 \qquad Bom \quad (good)$

C = 4 - 5.9 Regular (average)

D = 0 - 3.9 Insuficiente (fail)

Average of 5 required for graduation

NON-FORMAL EDUCATION

Law #5692 of 1971 created programs outside of the regular system to further adult education and to address problems of illiteracy. Supplementary education programs at primary and secondary levels were set up. Adults over age 18 are eligible to enter Supletivo 1° grau, and those over age 21 may enter Supletivo 2° grau. These classes are often conducted by parttime teachers from the public system, using whatever classroom space is available. Studies are geared to the individual, innovative teaching methods are used, and proficiency examinations may be accepted in

lieu of course work. Credit may also be given for work experience.

Up to 1985, the principal organization responsible for literacy programs was the Fundação Mobral Movimento Brasileiro de Alfabetização (the Mobral Foundation-Brazilian Movement for Literacy). These programs have since been put under authority of the Fundação Nacional para Educação de Jovens e Adultos-Educar (National Foundation for the Education of Youths and Adults).

Special education programs are available from pre-school to higher education

level for the physically handicapped, mentally retarded, children with behavioral problems, and gifted children.

There is also the Fundação Nacional do Indio (FUNAI), or National Foundation for Indians. Operating in those areas with significant native Indian populations, the foundation implements bi-lingual education programs coordinated by the Ministry of Education and the states. Programs are taught in the indigenous Indian language and introduce Indian children to the Portuguese language.

SENAI PROGRAMS

One area of education in Brazil which serves as a model for other Latin American countries is the semi-public training program called SENAI (Servico Nacional de Aprendizagem Industrial or National Industrial Apprenticeship Service). The program was created in 1942 by the federal government to provide training of high quality for the lower middle and working classes via youth apprenticeship courses and adult vocational training. SENAI is financed by a one percent tax on industrial payrolls and, legally, is a private, nonprofit institution attached to the Confederation of Industries.

Youths aged 14-18 are allowed to enter SENAI programs only upon completion of at least four years of formal education and success on an entrance examination. They then become "apprentice students" attached to specific industries. Their period of training lasts for

1600 hours or for two years and emphasizes both theoretical and practical training in occupational areas such as mechanics, metal-working trades, electricity and printing. SENAI offers some courses equivalent to secondary level education and can award diplomas which are recognized as parallel to those of segundo grau. SENAI training for youths is offered at training centers, most of which are concentrated in the southern states where most manufacturing takes place. However, there are SENAI offices in every state.

Adult workers in advanced training programs constitute the largest percentage of enrollments in SENAI programs. Adult vocational programs range from 60 to 660 hours, cover a wide number of occupations, and are usually night programs offered at SENAI centers. Shorter programs of 60 to 180 hours may be given on-

site in companies which want their workers' skills upgraded or specialized. Courses in electronics and automation are growing increasingly in demand.

SENAI programs graduate a half million students annually, or between four to six percent of the labor force, assisting Brazilian industry in meeting its needs and providing a means of upward mobility for the lower classes which is not afforded them by public education.

SENAC Serviço Nacional de Aprendizagem Comercial (National Service of Commerce) and SENAR Serviço Nacional de Agricultura (National Service of Agriculture) are similar national training programs. Since 1976, all vocational agencies have been under the government's National Vocational Training System, a division of the Ministry of Labor. Government supervision is weak, however.

SUMMARY.

Currently the Ministry of Education is proposing yet another set of policy reforms which would include a national educational system uniting federal, state and municipal systems, and decentralization of administrative authority.

Among the systemic deficiencies to be addressed would be the creation of a nationwide day-care program for children from birth to age 6; an increase in the school year from 180 to a minimum of 200 days, with a minimum of four hours of instruction daily; reorganization of the minimum curriculum contents of basic education; adoption of an alternative mechanism for access to basic education in any grade, independent of the previous scholastic level; organization of night schools at all levels; and application of the understanding of university autonomy.

Brazil has long looked to education to realize its place as a grand power in the concert of nations. This has proven an elusive goal. While plans have been ambitious, progress has been modest. The current state of the economy, continued high birth rates and entrenched oligarchical system do not promise quick solutions to Brazil's long unresolved problems.



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Special thanks to Mr. Tarcizi Lendonadi, Cultural Affairs, Department of Education, Embassy of Brazil, and to the Office of Education and Public Policy, Organization of American States, for their assistance in providing material for this article.