# Big-City Dropouts and Illiterates\*

The study of educational barriers to economic security summarized below was conducted under a grant provided through the cooperative research program of the Social Security Administration. It sought to rank big cities by their rates for high school dropouts and adult illiteracy and to discover whether differences in these rates were associated with certain features of the local economic and social structure. Because the findings and conclusions of the study may prove of interest to the readers of the Bulletin, they are summarized here. The presentation does not necessarily represent an endorsement of the conclusions by the Social Security Administration.

IN THE UNITED STATES, such credentials of schooling as diplomas and number of years completed have long been important for job and income prospects. Since World War II, the symbols of education have become crucial. In 1959, adult workers with eighth-grade diplomas earned \$3,600 a year on the average. Those who went on to high school but withdrew before graduating earned about \$4,300. High school graduates earned about \$4,800 on the average that year. The great gap between the income of college graduates and that of all others suggests that soon not even the high school diploma will offer much work and income security. Now it is clear that unemployment, underemployment, unstable prospects in the job market, and ineffectual drifting across jobs, are all strongly correlated with withdrawal from high school or junior high school.

Though low educational attainment is linked with unemployment and underemployment gen-

erally, it is in the city that this relation is most dramatic. The uneducated city dweller is consigned to low-level employment at low wages, or increasingly, to permanent unemployment. Before World War I, adult illiteracy was concentrated in rural populations and in seaport cities with large numbers of European immigrants. For the rural population the effects of adult illiteracy were somewhat less detrimental to family and individual security. The new order of deprivation is mainly urban and an outgrowth of rural migration. As the citywide migration of deprived households persists, central cities are affected to the extent that adult illiteracy helps transmit educational disadvantages, lower productivity, and reduce the flow of consumer goods. Big city economies have changed from dependence on cheap, abundant, unskilled labor to increasing dependence upon technical skills and job flexibility-abilities correlated with literacy and with level of formal education.

Policymakers and educational practitioners concerned with school withdrawal like to emphasize the extent of withdrawal. They typically report that about 1 out of 2 children who begin elementary school finishes high school and only half those who finish high school go on to college. On the surface, this is not too far from the facts. For every 1,000 students enrolled in the fifth grade in 1951, 582 graduated from high school by 1959, and 308 of this group entered college.

This is only the surface. If the dropout rate for fifth grade cohorts for each year from 1920 through the present is plotted, a rather smooth curve is obtained that shows a decline from about 80-percent high school withdrawal in 1920 to about 40 percent in 1960. Following the line of the resulting curve gives the definite impression that in 1975, about 30 students per 100 will fail to graduate from high school and that this number may drop to 20 by the end of the century. The historical data show a pattern of 8 decades of increasing levels of school retention, with a dramatic shift from an 80-percent likelihood of withdrawal from high school to an 80-percent likelihood of graduation.

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Those who argue that the dropout is a major national problem also neglect the question of absolute numbers. One seldom hears, for example, of the 500-percent expansion of the high-schoolage population between 1920 and 1960. It will probably rise by another 400 percent between 1960 and 1975. The historical statistics suggest that the number of high school dropouts has remained relatively constant. From 1900 to 1950, the number averaged about 600,000 annually; since then, the yearly crop of high school dropouts has numbered about 650,000. This absolute increase is slight if the baseline is the absolute number of youths of high school age.

#### **EMPLOYMENT AND AUTOMATION**

The main key to socio-economic advantage in our society is secure employment. But is graduation from high school a key to membership in the labor force, let alone to secure employment? A sound analysis of national survey data by the Bureau of Labor Statistics challenges the affirmative answer offered by most commentators on the dropout question.

The average national adult level of unemployment from 1959 to 1961 was about 6 percent. Young adults who graduated from high school between 1955 and 1958 were generally employed by the fall of 1961. The white young adults in this group achieved an employment level identical to the entire older national labor force. White young adult dropouts in the same cohort were twice as likely as the graduates to be unemployed, yet their unemployment level of 11.9 percent is low when contrasted with the nonwhite rate. About 94 percent of the white graduates were employed and 88 percent of the white dropouts.

Dropouts have an evident occupational handicap, but the handicap of race, of being nonwhite, is far greater. About 12 percent of the white dropouts were unemployed among those who had a few years to secure work, but nearly 18 percent of the nonwhite graduates in the same age group remained unemployed. Racial "minorityship" is a correlate of socio-economic disadvantage. Thus, a high school diploma is a further economic advantage to those who already have the socio-economic advantage. It has little apparent job

benefit to offer the youth stigmatized through discrimination.

Each year, most high school graduates and dropouts manage to find a way, however limited, into the labor force. They get jobs, though for many there is a lag between age 17 and the year of first real employment. This lag is greater for the dropout. For graduates, unemployment rates decline within 3 years after high school to about the level common to the entire civilian labor force. But the major youth problem is neither socioeconomic disadvantage nor failure to obtain a high school diploma. It is, rather, a steady breakdown in the absorption of the young noncollege graduate into the work force following the upgrading of occupational requirements through automation and the relation of this change to changes in the young adult population.

The absolute number of high school dropouts will probably remain fairly constant, even as the young adult population, because of the higher rate of school retention. But the total number of young adults will increase so markedly over the next decade that competition among noncollege graduates trying to enter the labor force in any capacity will be more severe than in any recent period except the great depression. Against this backdrop, high school graduation or the failure to graduate will not differentiate the employed from the unemployed—if there is no substantial change in the rate of national economic growth.

## **ADULT ILLITERACY**

The matter of low educational attainment or what is often called functional illiteracy among adults has also become a major concern of some welfarists and educators. Civilian labor force members under age 25 will account for nearly half of the total growth in the labor force during the present decade, but there will also be a 20-percent increase in workers aged 45 and over. Among this group and among the substantial number of unemployed and underemployed workers aged 25–44, illiteracy, or the functional equivalent of less than 5 years of school, constitutes a substantial barrier to income and job security.

Many large cities maintain programs of basic education for adults. The content of some of the programs reveals sharp awareness among educators of the relation between schooling and economic security; a few programs have shown that concerted efforts can be effective, though work with functional illiterates has not gone beyond demonstrations and pilot projects in any but the largest cities.

For example, the Department of Welfare in Cook County, Illinois, demonstrated in 1962 that adult welfare recipients could improve their employability and earning capacity through basic instruction in reading. A project in Atlanta, Georgia, combined basic reading instruction with job training for mothers receiving support under aid to families with dependent children. And in New Haven, Syracuse, Boston, and New York City, community action programs have developed promising pilot projects that bring relevant educational services to functionally illiterate adults.

These welfare-oriented educational programs in large cities will doubtless spread in the next 5 years. Before they are introduced widely, however, and perhaps before efforts to evaluate them are attempted, research should be conducted to describe, compare, and explain the educational characteristics of urban populations in terms of the relevant social and economic correlates.

### ORGANIZING HYPOTHESES OF STUDY

The study concentrated on the context of insecurity rather than on the individual or family characteristics associated with low educational attainment or with welfare dependency.

The major organizing and working hypothesis was: differences in levels of high school withdrawal and of adult functional illiteracy in large cities are functions of differences in urban community population composition, size, and change and of differences in occupational structure, personal income, and employment conditions. The study tested the hypothesis that, though a myriad of individual choices and dispositions influence the individual decision to withdraw from high school, these choices and dispositions are made within an equally determinative context of life prospects, which is most often and most objec-

tively reflected in indicators of growth, wealth, and employment.

This hypothesis is more pertinent to the dropout rate than to adult illiteracy. Low adult educational attainment is a social fact that reflects previous conditions. In one respect, the percentage of adults with less than fifth grade education may have no more relation to the current socioeconomic prospects or conditions of cities than some equally descriptive, yet historical variable, such as the percentage of adults who had whooping cough as infants. The organizing hypothesis was not, however, causal in the narrow sense. The study was concerned with the multiple correlates of two educational barriers to income and job security. One of these is static, and its correlates may not be viewed readily as determinants. The other—the dropout rate—may properly be conceived as the outcome of community context.

The minor working hypothesis was: departures of cities from levels of school withdrawal and adult illiteracy, as predicted from the best multiple regression equations obtained in testing our major hypothesis, are functions of differences in municipal expenditures for health, education, and welfare services. Here, the hypothesis suggests that a city with a lower dropout rate than would be expected from the regression analysis is probably a city where program or service activities—as reflected in expenditures—compensate for and thus serve to reduce the barrier to security implicit in low educational attainment.

#### **FINDINGS**

The empirical analysis supported consistently the main hypotheses: variations in dropout rates and levels of adult illiteracy in 131 of the largest cities are indeed functions of differences in levels of poverty, occupational mix, economic opportunity, and social mobility. It was found that how cities expend their public funds for health, welfare, and education is indeed associated with their citizens' educational characteristics, but only in a general sense.

The analysis supported the contention that withdrawing from high school before graduation

is not an individual event to be diagnosed, prevented, or otherwise treated individually. The significant psychological processes involved in dropping out are so structured that, in the aggregate, they occur only under predictable community conditions.

Dearborn, Michigan, for example, had a white dropout rate in 1960 half that of most cities and a third of the rate for Nashville, Tennessee. This difference is not randomly distributed; white youths withdraw from high school three times more frequently in Nashville than in Dearborn because the context of economic and social opportunities in Dearborn is that much more favorable to youths.

The term "context" refers here to the fact that big cities with expanding white-collar job markets also tend to be cities with more favorable income levels, housing, and employment security. Such cities as Nashville, St. Louis, Louisville, Cincinnati, and Jacksonville offered fewer work opportunities in 1960 and carried relatively larger numbers of impoverished families than did such cities as Dearborn, Portland, Berkeley, and Pasadena. The cities were deliberately chosen from different cultural regions of the United States. In fact, repeated analysis revealed that region is not correlated with either dropout rate or adult illiteracy after the social and economic differences of the various cities have been considered.

Cities with a high white dropout rate tended to be those with small rather than large whitecollar work forces, declining or static rather than expanding populations, and high numbers of very poor families in relation to population size. These factors alone account for nearly half the variation in dropout rates among cities.

To make the point clearer, the study examined the relationship between the cities' dropout rate (white and nonwhite combined) and their "community advantage"—a crude index consisting of four combined indexes: poverty—percent of families with incomes less than \$1,000; occupational mix—percent of male workers in local labor force; underemployment—nonworker ratio; and overcrowding—percent of occupied housing units with more than 1.01 person per room. A general linear relation obtained: the lower the level of advantage within a great city, the higher that city's dropout rate relative to others. (This type

of presentation confounds variables and may lead to spurious correlations, but it is clear and summarized what was assessed with precision through multiple regression analysis.)

The interpretation is similar for the two dependent variables but far from identical. High school withdrawal is sensitive to emerging economic conditions and prospects, and adult illiteracy is a cumulative but past condition. The high school dropout withdraws under the structural constraints of a social and economic context of low advantage. Functionally illiterate adults comprise the least mobile segment of the adult population—the segment that stays on in a city long after the labor market has deteriorated and wage earners with higher educational attainments have left for new urban frontiers. The two educational conditions are associated, yet a city might strengthen its context of advantage and reduce its dropout rate, while its accumulated number of poorly or incompletely schooled adults remained high. The association is therefore strong only at the extremes.

Cities with a high nonwhite dropout rate have fewer well-to-do nonwhite families, higher proportions of nonwhite unskilled workers as well as adult illiterates (both white and nonwhite), and more white dropouts. Deviant case analysis also suggests similar patterns to account for higher or lower dropout rates for both white and nonwhite cities than expected, with one exception: AFDC levels of expenditure are correlated with lower-than-expected levels of white school withdrawal but with higher-than-expected levels for nonwhites.

A wide range of explanatory variables was considered—most of them direct indicators of population characteristics, social or economic. The deviant case analysis might well have been expanded to include more, for there were some clues that relative levels of municipal expenditures on human services are associated with levels of school withdrawal and attainment. The study looked for meaningful qualitative evidence that cities deviated from the expected as a function of special programming efforts in education and welfare services, but as with the hypothesis that some regional effects would be reflected, none of the qualitative information indicated anything of significance.

Indeed, the correlation pattern was plain

enough without elaborate exploration of deviant cases. This pattern is one in which the odds that militate against graduating from high school for any given American adolescent vary notably from community to community, and these odds are in turn mainly a function of the odds militating against demographic and economic growth for any given community. No doubt there are important psychological and educational determinants of withdrawal from high school, but in the aggregate withdrawal is associated more relevantly with the growth prospects present not in the student but in the city he inhabits.

A static or stagnant big city will be one that is growing much more slowly or declining faster than comparable communities. As new centers of opportunity open up, better educated, more mobile adults and their households will migrate to them. Centers with no rising prospects will accumulate less well-educated adults. And, as local prospects become depressed further, this condition of the setting will depress the level of graduation from high school among adolescents.

## **Adult Functional Illiteracy**

Our analysis also supported our hypothesis about the proportion of adults with very low educational attainment in the large city. It was that cities with high rates of white in-migration and with occupational mixtures that contained a larger proportion of white-collar jobs, were cities with relatively low numbers of functionally illiterate adults. And cities with relatively smaller numbers of menial work for nonwhites and with lower levels of pervasive poverty in nonwhite households were those with relatively low numbers of functionally illiterate nonwhite adults. Rates of in-migration, poverty, and occupational opportunity were in fact common to both white and nonwhite correlations.

When adult illiteracy rates for the big cities are related to their level of "community advantage," the linear association is even more definite than for dropout rates: the mean adult illiteracy rate for the cities with the lowest economic prospects is about half again as high as the rate for the cities with the greatest community advantage.

#### **OTHER FINDINGS**

To find out if big cities that deviated from expectancy on either dropout or adult illiteracy rates also differed in the extent or quality of their educational and welfare services and programs, relevant local public agencies were questioned about programs designed to remedy or cope with problems of high school withdrawal, adult illiteracy, and welfare dependency. It was expected that cities with far fewer dropouts than expected would maintain more outstanding preventive or rehabilitative programs, for example, than those with excessive dropouts.

No relationship was found between the study's educational variables of dropout and illiteracy and the qualitative data on school and welfare programs; a finding consistent, incidentally, with the findings of no relation between region (or culture area) and either dependent variable among the deviant cities.

The city of Louisville, for example, had a much higher than average school dropout rate. It also maintains, and indeed maintained before 1959, several outstanding educational programs aimed at reducing the rate. It has a diligent guidance staff trained to help prevent school withdrawal and a continuing education program that includes a high school diploma program and many relevant types of job training. Moreover, the regular instructional programs of Louisville's secondary schools are differentiated along advanced academic, general, basic, and special educational "tracks." In spite of these services, or perhaps in conjunction or harmony with them, the total dropout rate by the study's measure was a high one-80, compared with the big-city mean of 50. Most crucially, Louisville was a city of comparatively poor economic opportunity in 1960.

The city of Dearborn, Michigan, in contrast, had a total dropout rate of 26. Yet Dearborn has most of the educational programs and services to be found in Louisville, including flexibility of curriculum, industrial education sequences, group guidance, and summer school offerings. The difference between Louisville and Dearborn is not in their services but in their levels of community advantage. Louisville was significantly below average on the measure of community advantage, and Dearborn was significantly above.

It appears, then, that the economic context is

fairly determinative. The educational and welfare services looked into and summarized for all deviant case communities, for one thing, are in no sense proportionate to the scale of need. In a very large city such as New York or Chicago, for example, from 100,000 to 400,000 citizens may be welfare dependents at any time. The number of citizens living at the same level of insecurity, moreover, is about twice that large. For New York City, for example, this means that in 1963, at least one million persons suffered economic deprivation.

Public services through schools and public welfare are nowhere commensurate with urban needs in either scope or relevance. Only a fraction of the insecure adult and late adolescent population received help from any public program and where services are rendered they do not offer the recipient a substantially improved opportunity for security. Therefore, with minor departures from the pattern, wage-earning prospects in the primarily private sector of urban or regional economies must be the dog that wags the tail of school holding power.

#### PROGRAM IMPLICATIONS

Health, education, and welfare expenditures, with other vital factors held constant, are generally related unfavorably to current levels of educational attainment. In other words, cities with higher levels of nonwhite school dropouts and adult illiterates than one would be led to expect from pertinent social and economic conditions are cities with higher than average education expenditures per pupil and AFDC expenditures per family. They are also cities that spend relatively more on health services.

It appears, then, that the public sectors of the municipal economy (including some of those with State and Federal sources) do not equalize and usually do not even compensate for differences in life prospects.

In pursuing this reasoning, however, and in emphasizing the determinative role of the economic context the sociological features of welfare programming are not ignored. The economic context of big cities is not being depicted as a matter of mere surplus or of relative deficiency in aggregate demand though this may be the case. "Stagnant" or "low advantage" cities are perhaps those situated in regional economies where demand is deficient solely because investment has not risen rapidly enough. The study data precede, of course, the 1963 tax cut, which appears to have demonstrated the force for economic growth generated when Federal budget surpluses cease to restrain investment. It is assumed that the new growth has modified the context of opportunity in several of the cities.

But the data and the interpretation emphasize not so much the concept of demand as the concept of the ecology of the labor market. The study began with a concern with income insecurity among youths and undereducated adults. It was therefore concerned with the social implications of the failure of urban employment to expand even as urban output continues to expand and with the progressive elimination of unskilled and semiskilled jobs by computers and general automation. It centered on the resulting ever-higher educational requirements underlying employment.

The reduction of deficiencies in aggregate economic demand, as through a tax cut, will have little durable bearing on the problems of poverty and dependency. In the big cities, they would have to be attacked directly through programs of vocational education, job retraining, urban redevelopment, concerted social services, rehabilitation, and improved benefits under extended social insurance. Tax reduction and other investment and demand-stimulating strategies, important as they are, may have little to do with helping the unemployed young or the displaced adult worker.

It is extremely difficult for the sociological imagination to envisage programs adequate to the magnitude of the situation. For example, it took public agencies in New York City many months in 1964 and early 1965 to arrange to open about 24 offices to receive applicants for 900 part-time and 4,500 full-time jobs under the new Neighborhood Youth Corps program. This program, intended specifically as an aid to high school dropouts, would not affect the total dropout population if it were magnified fivefold. And it is hard to grasp how it could be magnified at all or even repeated for a second or third year. About 40 percent of the jobs being offered are for posts in city departments.

For prompt educational action in a situation

described by the Cook County Department of Public Welfare as "a desperate social drag race with a fast moving urban giant [automation]," literacy training would have to be dispensed to hundreds of thousands of adults in a single city within less than a decade. The Chicago literacy program prescribes obligatory attendance at "social classrooms" for illiterate welfare recipients, but its program cannot be extended beyond limited neighborhoods—its current pilot application—without vast local and State and public expenditures, if then.

Most problematical, moreover, is the circular fallacy inherent in such programs, if the study findings have any validity. There may be a limited number of jobs available for newly literate adults fresh out of pilot programs in literacy training, but they are very apt to be like the very scarce jobs available in New York City for dropouts. If students withdrew from high school when work prospects are poor, will adults take literacy training seriously if jobs are not the reward for the effort?

#### CONCLUSION

Community action programs, innovations in welfare and educational services, training and retraining programs, are all helpful and relevant and often set in motion many other quests for political and economic solutions to insecurity, some of which may prove efficacious. Also, education-centered efforts in welfare may have value for the vitality of welfare agencies, somewhat apart from manifest outcomes. That is to say, unless programs endure, the ability of welfare agencies to adapt will be impaired. Programs that in some respects do not work must be maintained and changed periodically, or the very formal organizational machinery for doing anything will grow inflexible or will disappear.

It is hard to imagine these arguments proving

persuasive in the market place of program proposals and fiscal sponsorship, however. The educational barriers to economic security are not surmounted by the efficacy or scope of existing welfare or welfare-related educational efforts in the public sector of the economy. Even the relative distribution of these barriers in the big cities, in fact, is generally not affected.

Programs can no longer be tied to employability. Major national policies to the contrary notwithstanding, the era of trying to equip men and women to move from the welfare roll to the payroll is nearing its end. The new era seems to be one in which the problems of our major urban centers will make it clear that educational programs cannot resolve welfare or employment problems, or vice versa.

Even increased economic growth in some big cities will not resolve welfare problems in others. Welfare and social security programming should ideally be articulated with the character of the national and metropolitan area economies. Educational barriers to security are real when opportunities are limited. Therefore, compensation and protection against changing contingencies must be developed for citizens in areas and communities suffering tightening limitations. These steps are dynamic in ways that programs to prevent dropouts and programs to teach adults to read can never be, for they are nowhere as pertinent as unemployment insurance, disability insurance, and other forms of social insurance that can transcend local variations yet compensate protectively in periods of insecurity.

The speculation is that local welfare programs are of value as stimuli for change, publicity for challenges, and contributions to social service. But the combination essential for eliminating educational barriers to economic security is the combination of increased economic growth for urban communities on the one hand and increased, more diversified social insurance for individuals and households on the other.