



Stratification and Diversity in the Expanded System of Higher Education In Israel*

Hanna Ayalon and Abraham Yogev

The Gershon H Gordon Faculty of Social Sciences, Department of Sociology and Anthropology,
Tel Aviv University, Ramat Aviv, POB 39040, Tel Aviv, Israel.

E-mail: ayalon@post.tau.ac.il

The diversification of higher education systems into ‘first tier’ and ‘second tier’ institutions raises the issue of who gets to study where. The diversity approach suggests that the institutional enrollment of students will be mainly influenced by their social origins, whereas the stratification approach underscores the role of academic ability in the process of matching students and institutions. We hypothesize that the two approaches are not mutually exclusive and that their applicability is context-bound, depending on the characteristics of the second-tier institutions. The hypothesis was tested through a survey of a sample of about 4,500 Israeli freshmen enrolled in first- and second-tier institutions in the Israeli expanded and diversified higher education system. Multinomial logistic regressions of institutional enrollment revealed the role of the hierarchy of the second-tier institutions in shaping institutional enrollment and in preserving the advantages of privileged groups.

Higher Education Policy (2006) 19, 187–203. doi:10.1057/palgrave.hep.8300119

Keywords: institutional enrollment; second-tier institutions; educational opportunities

Introduction

Since World War II, systems of higher education have expanded rapidly and have been transforming organizationally. Expansion involves both a tremendous growth in the number of students and a diversification of institutions of higher learning (e.g., Trow, 1984). The latter often include first- and second-tier institutions that differ in selectivity, curriculum, administration, cost, academic versus practical orientation, and prestige (Meek *et al.*, 1996; Shavit, Arum, and Gamoran, 2004). In Israel, the focus of this article, the number of undergraduate students rose from 56,000 in 1991 to 170,000 in 2002. This expansion was due to the establishment of degree-granting academic colleges (Meltz, 2001).

One of the major questions that follow the diversification of higher education is who gets to study where, or what determines the students’ choice of a specific type of a higher education institution. The literature refers to two



competitive approaches, the functional diversity approach and the conflict-oriented stratification approach. The diversity approach regards the expansion of higher education as contributing to educational equality by institutional diversity, which caters to a differentiated student clientele. The stratification approach views this expansion as reflecting inter-institutional competition, resulting in a clear-cut stratification of both higher education institutions and their students. We hypothesize that the two approaches are not mutually exclusive and that their applicability depends on the characteristics of the second-tier institutions.

Approaches to the Expansion in Higher Education

According to the diversity approach, the *raison d'être* of new institutions of higher education rests on their contribution to diversity. Since they were designed mainly to meet specialized needs and to serve sectors disregarded by traditional universities, proponents of these new institutions see them as contributing to the widening demographic diversity of students in terms of ethnicity, gender, and age (Dey and Hurtado, 1999), thus increasing the democratization of higher education (Brubacher and Rudy, 1999: 424–428). Higher education institutions are viewed as horizontally differentiated in terms of their specific educational goals, modes of academic and managerial operation, and types of academic programs. The differentiated institutions are supposed to cater to different kinds of clientele. The diversity approach predicts that students in various types of higher education institutions will differ in their social origins and academic goals, without necessarily implying that these diversities reflect differences in academic ability.

The diversity approach views the hierarchical differentiation of higher education institutions as a marginal outcome of diversification. The stratification approach, by contrast, regards the expansion of higher education as reflecting mainly inter-institutional competition over the increasing demand for higher education. The vertical stratification of higher education institutions is a direct outcome of this competition (Teichler, 1988; Hearn, 1990; Dougherty, 1994). The immediate result of the academic stratification of institutions is the selection of students according to academic ability. This is due to the tendency of the more academically prestigious institutions to adopt a rather selective admission policy, and to the tendency of students with higher ability to choose such institutions for pursuing an academic career. Therefore, the stratification approach predicts that students' enrollment in the various types of institutions will be determined, first and foremost, by their level of academic ability. Institutional differences in students' social origins and academic goals will mainly reflect the effect of ability on institutional choice.



The two approaches of educational expansion lead to different views on the role of the second-tier institutions in equalizing educational opportunities. The notion that these institutions open the gates of higher education to previously excluded social groups is inherent in the diversity approach, which presumes that the new institutions will not cater to the traditional clients of higher education. This notion does not stem necessarily from the stratification approach, which underscores the role of academic ability in the process of matching students and institutions. If the new institutions cater to members of privileged groups, less able members of the traditional clientele of higher education may take advantage of the new opportunities, thus reducing the chances of new populations to enroll in higher education. This suggestion accords the Maximally Maintained Inequality (MMI) hypothesis of Raftery and Hout (1993), which posits that only when the enrollment rates of the privileged groups on an educational level reach saturation will expansion reduce inequality by incorporating new populations. Accordingly, the stratification approach does not exclude the option that the expansion of higher education provides members of privileged groups with new educational opportunities.

The two approaches lead to alternative hypotheses about students' institutional enrollment in a diversified system of higher education. The diversity approach predicts that institutional enrollment depends mainly on the students' socio-demographic characteristics, which represent different orientations to higher education. Academic ability may play a role in the shaping of institutional enrollment, but it will not be the major factor in the process. By contrast, the stratification approach hypothesizes that socio-demographic differences are a by-product of the effects of academic ability on institutional enrollment. This approach does not exclude the option that the new educational opportunities are mainly utilized by less able members of the traditional clientele of higher education.

The two hypotheses do not necessarily exclude each other; they should be viewed on a continuum, which depends on the modes of differentiation in higher education. Differentiation in higher education varies among countries, and expansion can take different forms (Shavit *et al.*, 2004). In some countries, the newly established institutions offer academic programs and grant academic degrees. As such, they may cater to members of the traditional clientele of higher education who could not join the selective institutions due to their lower academic ability (e.g., four-year colleges in the US, which are less prestigious than the elite universities, but offer similar fields and grant academic degrees). The stratification approach, which focuses on students' academic ability, is applicable to that mode of expansion. Other newly established institutions do not grant academic degrees (such as the community colleges in the US) or take the form of vocational or semi-professional training (e.g., the German



Fachhochschulen). These institutions are expected to cater to new populations of students. The diversity approach, which concentrates on socio-demographic characteristics, is more applicable to that mode of expansion.

Israel provides an appropriate setting to examine the opposite hypotheses stemming from the two approaches due to the mode of its expansion. The Israeli expanded system embraces a variety of institutions. In addition to differentiation between the veteran universities and the new colleges, there is also a remarkable differentiation within each sector, particularly among the various colleges.¹ Although all colleges offer academic degrees they differ in the opportunities they offer. Some colleges provide opportunities similar to those of the universities, thus potentially catering to the traditional population of students. Other colleges offer special programs or are *a priori* planned for new populations. This diversification implies that the two approaches may be applicable to different institution types in the Israeli system.

The Expansion of Higher Education in Israel

Originating in a system of government-supported universities, institutions of higher education in Israel are controlled by a public Council for Higher Education (CHE). This council, chaired by the Minister of Education, mainly consists of faculty members representing the various universities, and of representatives of the colleges and the public. The CHE's operational organ, the Planning and Budgeting Committee, consists of university representatives. It regulates the government's financial allocations to the universities and to various sorts of public colleges. The CHE accredits the programs of all higher education institutions. As such, the CHE autonomously controls the major part of developments related to the expansion of the higher education system.

The CHE has tended to view the expansion of Israeli higher education during the last decade as consisting of two stratified layers of institutions: the 'first tier' of universities *vs* the 'second tier' of colleges (CHE, 1997). This categorization, which overlooks the diversity of institutions within each sector, reflects their respective order of development and their relative status within the higher education system.

The present system of colleges consists of both publicly supported and privately owned institutions. Their diversity is also evident in their academic programs in terms of concentration on specific fields of study, the establishment of an independent academic faculty, and differing levels of student selectivity. As a basis for understanding this diversity, we distinguish five types of colleges, partly following the classification devised by the CHE (2000) itself.



Specialized colleges

Publicly supported institutions. Three of the eight specialized colleges were established prior to the 1990s, concentrating on academic fields not covered by the universities: visual arts, dance, and fashion studies. Four technological colleges were added or academically upgraded during the 1990s, and one general academic college — Tel Aviv College — was established by the CHE in consequence of increasing demand for higher education in that populated urban region. Tuition fees in these colleges, due to their public support, are publicly controlled and are equivalent to university fees. The academic programs and faculty of these colleges are well established, and their level of student selectivity is generally high, compared with other colleges. The programs of these colleges are not aimed at special populations, and they are expected to cater to the traditional clientele of the universities.

Private Israeli colleges

The initiation of privately owned undergraduate colleges in Israel was partly caused by the failing attempt of Tel Aviv University during the 1980s to establish a 'private' high-tuition fee track of law studies in response to the growing demand for these studies in Israel at the undergraduate level (Guri-Rosenblit, 1993). Indeed, the six operating private colleges concentrate in fields of study that are in great demand such as law, business administration, and computer studies. Therefore, they can charge high fees (more than double the publicly controlled fees). Their academic staff is highly established, and they are aimed at economically established students who could not meet the admission requirements of the universities, which are very high for most of the fields of study offered by these colleges (Lavie, 2002).

Regional colleges

Publicly supported institutions aimed at residents of the geographic periphery. The regional colleges were opened during the late 1960s and early 1970s as branches of various Israeli universities in rural regions, particularly in the northern and southern districts, which were distant from the universities operating at the time. The idea was to provide academic studies in a variety of fields, mainly the liberal arts, to geographically remote students who would later complete their undergraduate studies at the sponsoring university (Gamson and Horowitz, 1983; Horowitz and Volansky, 1999). Since the early 1990s six of the 10 regional colleges have gradually become independent of their sponsoring universities and were expanded and upgraded to degree-granting colleges in their own right. The financial responsibility for their expanded operations was subsequently shifted from the Ministry of Education directly to the CHE.



Branches of foreign universities

Particular types of private colleges are the branches of American, British, and Eastern European universities, which have flourished in Israel since the early 1990s. The foreign branches attract mainly older civil servants and teachers who wish to upgrade their work position and salary at minimal cost in academic effort (Kadosh and Menahem, 2000). International educational agreements obliged the CHE to approve these branches' operating as representatives of recognized foreign institutions, despite vast discrepancies in the length of study course and academic requirements between them and the local universities and colleges. Following public criticism, the Israeli Knesset amended the Law of the Council for Higher Education, requiring stricter formal standards from the foreign branches in order to receive CHE approval. In addition, the Ministry of Finance has recently encouraged the various ministries to establish academic examinations for employees who graduate from the foreign branches prior to approving their salary rise or other academic and administrative benefits.

Teachers training colleges

Publicly supported institutions offer programs of teachers' training for elementary and junior high schools. The universities do not offer similar programs. The training of teachers for these levels has traditionally taken place at specific training institutions operated by the Ministry of Education. Since the early 1990s, 19 of these institutions, spread all over the country and sometimes serving specific sectors (such as the state religious or the Arab school sectors), have undergone a rapid-academization process, which resulted in their being upgraded to colleges awarding the B. Ed. degree. While the academization of their study programs and of their teaching staff has been massive, the teachers training colleges do not cater to the traditional clientele of the universities (Kfir *et al.*, 1997).

Of all college types, the specialized colleges are the only kind to cater to a variety of populations and offer programs similar to those of the universities. They differ from the universities mainly in their lower selectivity, and student enrollment in institutions of this category is expected to fulfill the predictions of the stratification approach. We expect students at the specialized colleges to differ from students at the universities mainly in their scholastic ability. All additional institution types are designed for specific populations. Israeli private colleges are aimed at members of economically established families, regional colleges at residents of the geographic periphery, and foreign branches at older populations. Several teachers training colleges are aimed at Arab students. Otherwise they are expected to cater to a variety of populations. Still, members

of privileged groups are not interested in the teaching profession (Kfir *et al.*, 1997). The enrollment of students in these institutions is expected to follow the predictions of the diversity approach. The socio-demographic characteristics of the students are expected to affect their institutional choice beyond their academic ability.

The Study

The study was based on a survey conducted by the authors in 1999 for the Israeli Ministry of Education on a stratified-clustered representative sample of freshmen in 24 colleges and the six major universities. The survey data included students' socio-demographic characteristics; details of their current education; their educational history (high school track and achievements in exams that serve as acceptance criteria for higher education), and their institutional application patterns.

The sampling of students was based on their stratification by college or university type, geographic location, and study areas. We started by listing all colleges that offered at least one of the seven major fields of study provided by colleges in general: education and teaching, technology, business and economics, arts, law, architecture, communication, and social sciences. Within each field of study, we conducted an internal sampling according to college type and geographic location (north, center, south), so that all types of colleges and the different geographic areas were represented in the sample. Within each of the 24 sampled colleges, we randomly selected first-year compulsory courses in the selected fields of study. We included a sample of students from the same fields of study from the six major universities.

The survey was based on an anonymous questionnaire comprised mainly of closed items. The respondents answered the questionnaire while attending one of the first-year compulsory courses. After excluding non-completed questionnaires and inappropriate respondents (second-year students participating in first-year courses), the final sample was 4,054 students, of whom two thirds were enrolled at colleges and one third at universities.

Variables

Dependent variable

Type of Institution included six categories: university and the five college types described above (specialized, regional, teachers training, private colleges, and branches of foreign universities). The universities were combined into a single category despite their inner differentiation (Yogev, 2000) because, as noted, our major purpose is the confrontation of college with university students.

Explanatory variables

The explanatory variables included measures of socio-demographic and educational characteristics. Descriptive statistics of the variables, according to type of institution, are presented in Table 1.

Socio-demographic characteristics

The characteristics specific to the students themselves were age, gender (1 for females), nationality, and ethnic origin. Nationality was classified as Arab (coded 1) or Jewish (0). Among the Jewish students ethnic origin was classified as Mizrahi (Jews of Middle Eastern or North African origin, the Jewish disadvantaged ethnic group, coded 1), or other (Ashkenazi, Jews of European or American origin, and third generation Israeli Jews, all coded 0).

Other socio-demographic characteristics referred to the students' parents. Information on the parents was reported by the students in the questionnaire. The education of each parent was classified as academic versus other. The final variable (parents' academic education) consisted of the education of both parents; and had the value 1 when at least one parent had academic education, 0 otherwise. Parents' income was measured according to the respondents' evaluation of their family's position relative to the national income average. The variable ranged from 1 — much below national average, to 5 — much above national average.

Students also reported on their area of residence; this was classified as periphery, being the northern and the southern parts of Israel (1), and center (0). In Israel, the periphery is usually disadvantaged in terms of resources in general and educational opportunities in particular (Yogev, 1997).

Academic ability

Academic ability was defined by students' scores on the two examinations used as selection criteria by all universities and most colleges: the matriculation certificate (*bagrut*) and the psychometric test. The matriculation examinations are standardized tests that are taken by students on completion of their high school studies. The psychometric test is an aptitude test required by all universities and most colleges. The universities use a composed score of the two examinations as an admission criterion. We calculated that score (ranging between 200 and 800) according to the formula used by the universities, and used the composed variable (hereafter academic ability) in the analyses.

Treatment of missing values

In the multivariate analyses missing values were substituted by the means for the quantitative variables, and by the mode for the nominal ones. For each

Table 1 Descriptive statistics of the variables according to institution type

	<i>University</i>	<i>Specialized college</i>	<i>Regional college</i>	<i>Teachers training college</i>	<i>Private college</i>	<i>Foreign branch</i>	<i>Total</i>
<i>Categorical dummy variables (proportion within each cell)</i>							
Female	0.57	0.42	0.49	0.91	0.52	0.57	0.56
Mizrachi origin	0.23	0.21	0.34	0.42	0.33	0.38	0.28
Arab	0.02	0.02	0.09	0.14	0.04	0.02	0.04
Periphery	0.22	0.23	0.48	0.45	0.15	0.14	0.25
Parental academic education	0.61	0.58	0.38	0.26	0.45	0.32	0.51
Vocational track	0.10	0.22	0.34	0.20	0.16	0.24	0.17
<i>Continuous variables (means and standard deviations)</i>							
Age	22.76 (2.34)	22.94 (2.32)	24.80 (4.69)	22.57 (3.55)	23.28 (2.95)	33.25 (10.52)	23.50 (4.19)
Family income	3.42 (1.00)	3.23 (1.08)	2.99 (1.04)	2.81 (1.00)	3.37 (1.00)	3.02 (1.02)	3.28 (1.03)
Academic ability	622.19 (59.76)	570.47 (61.16)	524.78 (61.79)	495.36 (68.88)	562.68 (48.62)	548.70 (57.37)	578.86 (73.22)
<i>N</i>	1152	595	337	180	774	180	4054

variable, dummy variables, coded 1 for missing values, were introduced into the equation (according to the strategy suggested by Cohen and Cohen, 1983). However, most dummies did not reach statistical significance and they had no effect on the results. To gain degrees of freedom, we omitted from the analysis the dummies that had no effect on the results. In the final equations, we include two dummies that reached statistical significance in some categories: *incmis*, representing the missing values of income, and *abilitymis*, representing the missing values of academic ability. Income and academic ability were the variables with the highest proportion of missing data (income 6%, academic ability about 17%). The proportion of missing values for the other variables was lower, usually less than one percent.

Results

We approached this issue with two multinomial logistic regressions. Institutional type was the dependent variable, with universities as the reference category. The first model considered the effect of socio-demographic characteristics on post-secondary destination. In the second model, academic ability was added to the analysis. This model assessed the impact of educational selection on institutional enrollment, as well as its mediating effect on the link between socio-demographic characteristics and destination.

Socio-demographic characteristics

The first model of the multinomial logistic regression (Table 2, column 1) presents the socio-demographic profile of the students in the various institution types. One finding was common to all college types except the specialized colleges: children of better-educated parents were more likely to enroll at the universities than at the colleges. In other words, students in most colleges originated from lower social strata than university students. This was not true for the specialized colleges, where students did not differ from university students regarding parental education.

Significant differences emerged between the various college types regarding the additional socio-demographic characteristics of their students. Economically established parents decreased their children's likelihood of enrolling at the specialized or the teachers training colleges. Economic background did not differentiate between university and college students in all other college types.

The uniqueness of the specialized colleges, which, as noted, cater to the traditional clientele of higher education, was also revealed by the enrollment patterns of the disadvantaged ethnic groups. Mizrahi were less likely than non-Mizrahi students to enroll in the specialized colleges than in the

Table 2 Two models of multinomial logistic regression for institutional enrollment

	<i>Specialized college</i>		<i>Regional college</i>		<i>Teachers training college</i>		<i>Private college</i>		<i>Foreign branch</i>	
	<i>1</i>	<i>2</i>	<i>1</i>	<i>2</i>	<i>1</i>	<i>2</i>	<i>1</i>	<i>2</i>	<i>1</i>	<i>2</i>
Female	−0.62*	−0.73*	−0.33*	−0.49*	1.88*	1.69*	−0.09	−0.22*	0.13	−0.00
Mizrachi	−0.29*	−0.27*	0.22	0.21	0.64*	0.69*	0.34*	0.37*	0.17	0.14
Arab	−0.58	−0.52	1.54*	1.87*	1.74*	2.00*	1.13*	1.25*	0.91	1.03
Age	0.01	−0.07*	0.19*	0.10*	0.07*	−0.04	0.08*	0.03	0.31*	0.23*
Periphery	0.01	−0.06	0.89*	0.79*	0.80*	0.58*	−0.57*	−0.06*	−0.53*	−0.63
Parental academic education	−0.14	0.11	−0.55*	−0.19	−1.02*	−0.41*	−0.59*	−0.29*	−0.72*	−0.42*
Family income	−0.19*	−0.07	−0.01	−0.04	−0.25*	−0.04	0.06	0.17*	0.14	0.30*
Incmis	0.02	0.13	−0.03	−0.02	0.10	0.52	0.22	0.42*	−0.09	−0.05
Academic ability (*100)		−1.63*		−2.70*		−3.29*		−1.83*		−2.17*
Abilitymis		−0.04		1.30*		−0.11		−0.97*		0.78
Constant	0.14	10.95*	−5.49*	11.53*	−3.50*	16.80*	−2.41*	9.61*	−10.34	3.70*

* $P < 0.05$.

Pseudo $R^2(1) = 0.12$.

Pseudo $R^2(2) = 0.23$.

Log likelihood (1) = −5533.39.

Log Likelihood (2) = −4828.68.

universities. This was also true for Arabs, although the coefficient of *Arab* did not reach statistical significance. This finding is of special interest because it implies that the common perception that underprivileged students are more likely than privileged students to enroll at 'second-tier' than at 'first-tier' institutions (e.g. Ambler and Neathery, 1999) does not hold in all contexts. When the opportunities offered by the second tier are similar to those offered by the first tier the picture maybe reversed, depending on other characteristics of the various institutions. We shall get back to this point later. The disadvantaged ethnic groups were relatively likely to enroll at teachers training colleges, which cater to weaker populations, and at Israeli private colleges, which are aimed at economically established populations. Arab students were more likely than Jewish students to enroll at regional colleges than at the universities.

Residents of the periphery were more likely than residents of the center to enroll at the regional colleges (which, as noted, were established for that population), and at the teachers training colleges (some of them located in the periphery). Their enrolling at the two private college types was less likely than their enrolling at the universities. This is not surprising considering that the private colleges are usually located at the center of the country and, as noted, charge high-tuition fees.

The picture that emerges from this part of the analysis is not clear-cut, but it does illustrate a certain pattern. The students of the various college types do not share the same social profile. Students of all college types, except the specialized colleges, originate from less-educated families than university students. The institutions that are expected to cater to specific populations usually do that. Residents of the periphery enroll at the regional colleges, and older and wealthier students enroll at the foreign branches. The regional and teachers training colleges, which are aimed at disadvantaged populations, cater to the disadvantaged ethnic groups, Mizrachim (teachers training colleges) and Arabs (both college types). Students of the disadvantaged ethnic groups are more likely than students of the privileged ethnic group to enroll at the private colleges than at the universities, but they prefer the universities over the specialized colleges.

Educational selection

The inclusion of academic ability in the analysis (model 2) made possible the confrontation of the diversity and stratification approaches. In consequence of that step, the effect of parental education became significantly smaller in all equations (losing between 43 and 70% of its magnitude), but it lost its statistical significance only in the equation of regional colleges. The lower social background of students of the colleges was, at least partly, a by-product



of their lower academic ability, as implied by the stratification approach. Still, academic ability did not capture the full effect of parental education on enrollment for teachers training and private colleges, and for the foreign branches. Children of less-educated parents were more likely to enroll in these institution types than in the universities even when their scholastic ability allowed university enrollment.

Controlling for academic ability did not change the effects of *Arab*, *Mizrachi*, or *periphery* in the various equations. In other words, the institutional preferences of residents of the periphery and of the disadvantaged ethnic groups were not a by-product of their lower-academic ability. Those preferences had other roots, probably related to the characteristics of the various institutions, as suggested by the diversity approach. Arabs and residence of the periphery preferred the regional and teachers training colleges over the universities, and Mizrachim preferred teachers training colleges over universities, regardless of scholastic ability. The diversity approach was also applicable to the enrollment of Arabs and Mizrachim in the specialized and private colleges. Academic ability did not explain the reluctance of Arabs and Mizrachim to study in the specialized colleges or their inclination for the private colleges. Additional analyses showed that the institutional choice of the disadvantaged ethnic groups was related to field of study. Mizrachim and Arabs alike preferred to study professions: Arabs preferred teaching and law, and Mizrachim preferred teaching, law, business and technology.² Specialized colleges do not offer teaching and law. They offer technology, and, indeed, most Mizrachim (about 51%) who studied at these colleges studied that field. Private colleges offer mainly law, business, and technology. In all, 87 percent of the Mizrachim in these colleges studied these fields. In a direct question, we asked the respondents about the effect of the practicality of the studies in their choice of institution of higher education. Mizrachim and Arabs scored higher than non-Mizrachi Jews on that item.³ This pattern is in accordance with findings in other countries, which showed that students of underprivileged groups preferred the professions over less practical fields of study (Davies and Guppy, 1997). The universities set very high admission cutting-points for the professions (except teaching), but are much more flexible in their requirements in less practical fields of study. With some speculation, we may suggest that Arabs and Mizrachim prefer studying a profession at the colleges to studying a less practical field at the universities, even when their scholastic ability allows enrollment in the less selective university departments.

Following the inclusion of the academic ability, the coefficients of income in the equations of the private colleges and foreign branches became greater and gained statistical significance. For students of similar academic ability, children of economically established families were more likely than children of less wealthy families to enroll at the various privately owned colleges than at



universities. The privately owned colleges, which are aimed at wealthier population, indeed absorbed their target population. One finding was common to all college types: the academic ability of their students was lower than that of university students. This implies that despite the remarkable within-college variations, the colleges attract less able students, thus constituting the second tier of higher education in Israel.

Discussion

Our findings support, in the Israeli context, the hypothesis that the applicability of the diversity and the stratification approaches to students' institutional enrollment in a diversified system of higher education is context-bound. It depends on the characteristics of the second-tier institutions. The stratification approach is more applicable to college *vs* university enrollment if the second-tier institutions cater to a variety of populations, including the traditional clientele of higher education. This happens when the second-tier and the first-tier institutions carry similar characteristics and are distinguished mainly by differential selectivity. The diversity approach is more applicable to institutional enrollment if the second-tier institutions cater to populations that are not the traditional clients of higher education. This implies that the effect of the expansion and diversification of higher education on social inequality in institutional enrollment may vary not only according to education systems, but also between various institutions in the same system. Second-tier institutions that cater to the traditional clientele of higher education open the door to higher education for less able members of privileged social groups, and the social profile of their students does not differ from that of university students. The Israeli specialized colleges, which differ from the universities mainly by their lower selectivity, bring this pattern to an extreme. Students at these colleges had lower academic ability than university students, but similar parental education, as predicted by the stratification approach. Students of specialized colleges differed from university students in their ethnicity, but the direction was opposite to that expected: the disadvantaged ethnic groups were *less* likely to enroll at these colleges than at the universities.

Second-tier institutions, which are expected to respond to the needs of specific populations, attracted their target populations, thus opening higher education to new social groups. Still, these institutions frequently offered less attractive and less rewarding fields of study, creating a hierarchy between the second-tier institutions. Institutional stratification did not stand in the center of the diversity approach, but our findings imply that the hierarchy between the various second-tier institutions is inherent in the mechanisms that correspond to the predictions of that approach.

Our findings suggest that in diversified higher education systems, diversity operates within stratification, as institutions that absorb disadvantaged populations are usually less prestigious. The Israeli private colleges are an exception. Compared with university students, students of the private colleges carry a special social profile: they belong to less-educated populations, to disadvantaged ethnic groups, and to economically established families. The private colleges offer mainly prestigious and lucrative fields of study, thus producing a mobility channel for economically established members of otherwise disadvantaged social groups. When educationally and ethnically disadvantaged groups are economically established, they manage to enroll in institutions that offer major educational and occupational opportunities. It is interesting to note that the institutions that offer (wealthy) members of disadvantaged ethnic groups a chance for upward mobility were initiated by private entrepreneurs, who did not carry the flag of social equality, and not by public bodies, which constantly justify the expansion of higher education by its role in reducing inequalities.

To sum up, our findings support the approaches, which claim that privileged social groups take the greatest advantage of the expansion of educational systems, but they also reveal the complexity of the mechanisms that produce that pattern. When expansion is accompanied by diversification, its social implications are largely shaped by the type of diversification, particularly the characteristics of the second-tier institutions. Members of disadvantaged groups enroll more often in institutions that offer limited opportunities, thus preserving the advantages of privileged groups. In this context, the social role of the private colleges is of special interest. Usually, these colleges are analyzed as enhancing the advantages of less able members of the traditional clients of higher education (Swirski and Swirski, 1997). This fact notwithstanding, our findings show that the private colleges also improve the opportunities of economically established members of otherwise disadvantaged groups. In other words, the ownership of economic resources helps students who do not belong to the traditional clients of higher education to compete for vacancies in institutions that promise future advantages.

Which second-tier institutions are more effective in decreasing inequality in higher education enrollment? Our findings hint at the pros and cons of the various kinds of second-tier institutions. Second-tier institutions that are similar to the first-tier ones offer better opportunities, but they absorb either less able members of privileged social groups or economically established members of otherwise disadvantaged groups. Other members of disadvantaged groups are more likely to enroll in higher education when the second-tier institutions do not cater to members of privileged groups, but these institutions offer only limited opportunities. If the alternative to enrolling at the less prestigious higher education institutions is non-enrollment, we may conclude



that the diversification of higher education carries positive, albeit limited, implications for the reduction of inequality in higher education. If, on the other hand, the newly established institutions prevent members of disadvantaged groups from applying to the universities, they will not decrease, but will even enhance, inequality. It takes further research to study which of the last options is valid in diversified higher education systems.

Notes

* The paper is based on a study conducted by the authors for the Israeli Ministry of Education. We thank Limor Gerbat, Moshe Lavi and Timna Ziv for their research assistance. Authors' names are listed in alphabetical order to denote their equal contribution. Correspondence to Hanna Ayalon.

1 The Israeli universities can be divided into elite and non-elite institutions (see Yogev, 2000, for further details). Since our study concentrates on the differences between the universities and the colleges, we do not refer to the within-university differentiations.

2 In all, 19 percent of the Mizrachim and 38 percent of the Arabs in our sample study teaching, compared with 11 percent of the non-Mizrachi Jews; the parallel proportions for law are: 13, 15, and 10 percent, respectively. In all, 26 percent of the Mizrachim study technology compared with 24 percent of non-Mizrachi Jews. In all, 21 percent of the Mizrachim study business, compared with 18 percent of non-Mizrachi Jews. Mizrachim and Arabs are underrepresented among students of social sciences (13 and 15%, compared with 21%), and arts (4 and 1%, compared with 10%).

3 On a five-point scale ranging from 1 (did not affect) to 5 (had strong affect), Mizrachim had a mean of 2.80, Arabs 3.14, and non-Mizrachi Jews 2.54. All differences between the means were statistically significant.

References

- Ambler, J.S. and Neathery, J. (1999) 'Educational policy and equality: some evidence from Europe', *Social Science Quarterly* 80: 437–456.
- Brubacher, J.S. and Rudy, W. (1999) *Higher Education in Transition: A History of American Colleges and Universities*, 4th edn. New Brunswick and London: Transaction.
- CHE (Council for Higher Education, Israel). (1997) 'Higher education in Israel toward the third millennium', *Bulletin* 9(July). (Hebrew) 5–6.
- CHE (Council for Higher Education, Israel). (2000) *Annual Report No. 25, 1997–1998*, Jerusalem: Planning and Budgeting Committee (Hebrew).
- Cohen, J. and Cohen, P. (1983) *Applied Multiple Regression/Correlation Analysis in Behavioral Sciences*, Hillsdale, NJ: Erlbaum.
- Davies, S. and Guppy, N. (1997) 'Fields of study, college selectivity, and student inequality in higher education', *Social Forces* 75: 1417–1438.
- Dey, E.L. and Hurtado, S. (1999) 'Students, colleges, and society: considering the interconnections', in P.G. Altbach, R.O. Berdahl and P.J. Gumport (eds.) *American Higher Education in the Twenty-first Century: Social, Political, and Economic Challenges*, Baltimore and London: Johns Hopkins Press, pp. 298–322.
- Dougherty, K.J. (1994) *The Contradictory College: The Conflicting Origins, Impacts and Futures of the Community College*, Albany: SUNY Press.



- Gamson, G. and Horowitz, T. (1983) 'Symbolism and survival in developing organizations: regional colleges in Israel', *Higher Education* 12: 171–190.
- Guri-Rosenblit, S. (1993) 'Trends of diversification and expansion in Israeli higher education', *Higher Education* 25: 457–472.
- Hearn, J.C. (1990) 'A pathway to attendance at elite colleges', in P.W. Kingston and L.S. Lewis (eds.) *The High-Status Track: Studies of Elite Schools and Stratification*, Albany: SUNY Press, pp. 121–145.
- Horowitz, T. and Volansky, A. (1999) 'From a monolithic to a pluralist system: Change processes in the higher education system of Israel (1948–1996)', in E. Peled (ed.) *Fifty Years of Israeli Education*, Jerusalem: Ministry of Education Culture and Sports (Hebrew), pp. 911–937.
- Kadosh, F. and Menahem, G. (2000) 'Structural changes in higher education in Israel in the 1990s: The paradox of a state sponsored private market', *Israeli Sociology* 2: 499–522 (Hebrew).
- Kfir, D., Ariav, T., Fejgin, N. and Liebman, Z. (1997) *The Academization of the Teaching Profession and Teacher Education in Israel*, Jerusalem: Magnes (Hebrew).
- Lavie, Moshe (2002) *The Expansion of Israeli Higher Education System — Did Financial Barriers Replace Achievement-Oriented Barriers?* Thesis submitted for the MA degree in Humanities, Tel Aviv University.
- Meek, L.V., Goedegebuure, L., Kivinen, O. and Rinne, R. (1996) 'Conclusion', in V.L. Meek, L. Goedegebuure, O. Kivinen, and R. Rinne (eds.) *The Mockers and Mocked: Comparative Perspectives on Differentiation, Convergence and Diversity in Higher Education*, New York: Pergamon for the IAU Press, pp. 206–236.
- Meltz, Noah M. (2001) 'Academic colleges: transforming higher education in Israel', *Higher Education Policy* 14: 343–359.
- Raftery, Adrian E. and Hout, Michael (1993) 'Maximally maintained inequality: expansion, reform and opportunity in Irish education 1921–1975', *Sociology of Education* 66: 41–62.
- Shavit, Yossi, Arum, Richard and Gamoran, Adam (2004) 'Expansion, differentiation and stratification in higher education: a comparative study of 15 countries', *Paper presented at a meeting of the Research Committee on Social Stratification and Mobility of International Sociological Association*, held at Neuchatel (Switzerland) (May).
- Swirski, S. and Swirski, B. (1997) *Higher Education in Israel*, Tel Aviv: Adva Center, Information on Equality 8 (Hebrew).
- Teichler, U. (1988) *Changing Patterns of the Higher Education System: The Experience of Three Decades*, London: Jessica Kingsley.
- Trow, M. (1984) 'Problems in the transition from elite to mass higher education', pp. 132–164 in *Policies for Higher Education*, from the General Report on the conference on Further Structures of Post-Secondary Education. (Paris: OECD).
- Yogev, A. (1997) 'Autonomy and choice as school strategies for peripheral communities in Israel', in R. Shapira and P.W. Cookson (eds.) *Autonomy and Choice in Context: An International Perspective*, Oxford: Pergamon, pp. 172–202.
- Yogev, A. (2000) 'The stratification of Israeli universities: implications for higher education policy', *Higher Education* 40: 183–201.

Reproduced with permission of the copyright owner. Further reproduction prohibited without permission.