

Iowa State University

From the Selected Works of Linda Serra Hagedorn

Spring 2006

Transitions within the Community College: Pathways to Access and Inclusion.

Linda S. Hagedorn, *University of Florida*
George M. Prather



Available at: https://works.bepress.com/linda_hagedorn/31/

Transitions within the Community College: Pathways to Access and Inclusion

Linda Serra Hagedorn

University of Florida

George M. Prather

Los Angeles Community College District

Community colleges are often criticized for the low numbers of students who ostensibly appear successful. This article takes a unique look at the pathways many community college students take and redefines success as transition. Using the full population of the Los Angeles Community College District, this article examines the intra-institutional transitions of 1) remedial to college level, 2) English as a second language to traditional college courses, and 3) lower to higher academic goals. Analyses revealed that: 1) those students at the lowest levels of developmental English and math were much less likely to transition than those who began their studies closer to college level; 2) most successful transitions from ESL occurred within the first year, but many students required a much longer time span; and 3) while some students changed their educational goals, most (about 90%) retained their original plans.

High school and most four-year college students make clear transitions; freshman to sophomore, sophomore to junior and junior to senior years. Although a recent coining of the term “fifth year senior” has recently come into common usage, transitions are generally clear, clean, and obvious. There are clear “marker events” that administrators and students alike observe. In contrast to high school or university undergraduates, community college students are more likely to be unaware of their class level status and accomplishment (Grubb, 1991; Maxwell, Hagedorn, Cypers, Lester, & Moon, 2004). The community college in general lacks milestones for transitions and progression. For example, there are no overt indications to students when they cross

important thresholds such as transitioning from freshman to sophomore status. In fact, the ways in which community college students interact with their institutions tend to obscure marker events. They often spend multiple years (not necessarily consecutively), carry less than a full-time credit load, and may be enrolled in below-college-level courses. Compounding the scarcity of marker events are the generally unmanageable workloads of most community college academic advisors. The aggressive advisement and intrusive assistance needed to guide students across transitional lines occur too infrequently.

Drawn from research produced by Los Angeles Community College District (LACCD), the transitions we study in this article are intra-institutional in

nature, they depict student movements that are totally contained within the community college. The transitions we cover are 1) from remedial to college level, 2) from English as a second language to traditional college courses, and 3) from lower to higher academic goals. Our sample is drawn from the LACCD, one of the largest multi-campus districts in the United States, and includes a population of 29,079 students who were first time enrollments at any one of the district's nine campuses in the fall of 2000. The study population likely shares multiple characteristics with other large urban community college districts. Specifically, we used transcript analysis and inquiry into student records.

Transition: From Remedial/ Developmental to College Level

The prevalence of basic skills education cannot be overstated. According to the latest statistics, 73 percent of all community colleges and technical schools offer noncredit basic skills instruction (Bellis, 2004). While the proportions have been growing, basic skills education in reading, writing, or mathematics has been offered at many community colleges for some time (Lewis & Farris, 1996). At some community colleges, the majority of students begin their collegiate studies with some courses at below college level. The National Center of Education Statistics estimates that 42 percent of all beginning community college students are enrolled in one or more remedial courses (Parsad & Lewis, 2003). The proportions of basic skills students vary greatly by campus ranging between 30 to 90 percent of all students (Shults, 2000; Spann, 2000).

The mission statements of virtually all community colleges include the goal of assisting all students to complete their educational goals. For many reasons, including in some states specific statutory charges, community colleges have historically offered basic skills education to those students who are not ready for college level coursework (Perin, 2002). The prevalence of basic education in community colleges has fueled a significant controversy. High schools are often criticized for not educating students properly leaving postsecondary education to "pick up the pieces" and repeat the high school curriculum. This

responsibility largely falls on public community colleges. Some scholars note that developmental education turns higher education into an expensive high school and prevents community colleges from using valuable and finite resources on other missions, such as transfer (Davis, 1999). Alexander Astin believes that, "the education of the 'remedial' student is the most important educational problem in America today, more important than educational funding, affirmative action, vouchers, merit pay, teacher education, financial aid, curriculum reform, and the rest" (Astin, 1998, p. 12). While the outcomes of remedial education are not always well-documented in the literature, Adelman (1998) reported that although enrollment in remedial courses may affect bachelor's degree completion, it appears not to be an impediment to degree completion for those students needing only one or two courses below college level.

Amidst the controversy on both sides, most community colleges have implemented developmental courses and have supported tutoring or learning centers to assist those students in need of pre-college academic assistance (Oudenhoven, 2002; Perin, 2002). Students enrolled in basic skills programs are likely to benefit from special attention and services as they are more likely to be parents, members of a minority group, and/or low-income workers living at or near poverty than those community college students who are at college level (Washington State Board for Community and Technical Colleges [WSBCTC], 2001).

Developmental Education Student Success

The factors that promote success among students who enroll in developmental courses are sparsely reported in the literature. However, a study that examined community college students enrolled in remedial courses in Texas found that student success, defined as a passing grade point average after five semesters of enrollment, was related to age, initial skill deficiency, and enrollment patterns (Burley, Cejda, & Butner, 2001). The study found that younger students and those who needed less remediation were much more likely to be successful. Also, those students who enrolled in developmental coursework for

consecutive semesters were more successful than those who “stopped out” and tried to resume the next level in a later semester. Another study found that learning communities aid those students who require remedial education (Cantone, 2001). It was argued that cooperative learning fosters more peer interaction which ultimately leads to an increase in student success. Finally, Hadden (2000) advocated for mandatory placement tests that assess the skill level of incoming students and place them in the appropriate course level. While there is little agreement about the best ways to assist remedial students to success, there is a great deal of evidence and concurrence that the numbers of remedial students are rising (Parsad & Lewis, 2003). At the same time evidence suggests that fewer community college students than is desirable actually master remedial material and emerge in college-level coursework (Merisotis & Phipps, 2000; Parsad & Lewis, 2003).

English as Second Language Learners

According to the 2000 Census, 18 percent of the United States population speaks a language other than English at home (Shinn & Bruno, 2003). In a nationwide survey of community college students, Ellis (1999) found that nearly 89 percent of non-native English students initially came to the community college to work on their language skills before taking more advanced courses. While many of the second language learners have been living in the U.S. for some time, others are newer arrivals. Newly immigrated students are likely to have had little education prior to entering the community college and thus do not have a strong literacy even in their native tongue (Wrigley, 1993). Further, the effects of Generation 1.5, those individuals who immigrated to the US as children or young adolescents, are now being felt in educational circles. Their experiences may be very different from immigrants who have entered the United States as adults (Blumenthal, 2002; Lee, 2001; Hurb, 1990). Generation 1.5 students are likely to have grown up in the United States, perhaps receiving partial instruction in our educational system. Unlike immigrants entering the country as adults, Generation 1.5 individuals may appear to have a mastery

of conversational English but may be lacking in the more advanced uses of English grammar and syntax, thus becoming victims of frequent grammatical and pronunciation errors (Blumenthal, 2002).

There are two distinct categories of programs to assist those for whom English is not a native language: academic ESL and adult education ESL. Academic ESL classes tend to offer institutional credit while charging standard tuition and thus are geared towards preparing students for transition or transfer on to further education. Typically the credits do not apply toward graduation or the Associate of Arts (AA) degree. In contrast, adult education ESL classes tend to be no-credit, tuition-free and thus are aimed at helping students achieve more “fundamental and functional goals related to survival or vocational matters” (Blumenthal, 2002). The difference between academic and adult education ESL classes reflects the long-standing debate about whether ESL programs should be of a “general” or a “functional” nature (Sticht, 1990). In a review of the literature on transitioning between adult and academic ESL programs, Rance-Roney (1995) reported that very few ESL students from adult education classes actually transition to academic ESL programs.

From Lower to Higher Academic Goals

The multiple missions of the community colleges often attract students into one goal track, but through academic exposure or other avenues may lure or entice them into another. Therefore, a frequent transition that occurs in community colleges is goal shifting. While much of the literature critical of community colleges is focused on students whose goals shift away from degrees (Brint, & Karabel, 1989; Clark, 1960; Dougherty, 1994), there is less attention paid to students whose tenure at the community college results in an upward shift in goals. Here, we concentrate specifically on shifts from 1) adult basic education (ABE) to general college courses, 2) General Education Diploma (GED) to college level, 3) certificate only to degree seeking, and 4) less than the baccalaureate to transfer.

ABE Students

Adult Basic Education (ABE), typically housed within the domain of basic skills instruction (oftentimes confused with ESL and GED instruction), is intended for those students with less than ninth grade reading writing and/or math skills (WSBCTC, 2001). ABE students are not typically degree-seeking, at least early in their first contacts with community colleges. A comprehensive review of ABE in California, Connecticut, Hawaii, Iowa, and Oregon provides insight into the status of these programs in community colleges (Rickard, Stiles, & Jacobsen, 2003). Results indicated that ABE constitutes anywhere from 6 to 17 percent of non-credit enrollments and 2 to 7 percent of the total enrollment in the community colleges. ABE students range from beginning and basic literacy levels to intermediate low and high levels of basic education. Due to the great diversity, their relatively low numbers, and the level of support needed for these students, ABE programs may not be a concerted focus for administrators and faculty (Rickard, Stiles & Jacobsen, 2003). Further, some state agencies and institutions other than community colleges have statutory responsibility for the provision of ABE. While few students do manage to transition from ABE to general college courses, there has been no research on the factors that support such moves.

GED Students

The General Education Diploma (GED) represents an understanding of high school level knowledge. The GED, or High School Equivalence Diploma, is awarded to adults who have not graduated from high school but have demonstrated, through the passing of exams, knowledge consistent with high school graduates (Sessoms & Taylor, 1997). Preparation programs for the passing of exams has typically been offered by community colleges and independent, external programs.

According to the National Adult Literacy Survey, more than 46 million adults lack a high school diploma (Kirsch, Jungeblut, Jenkins, & Kolstad, 2002). In 2001, there were 1,016,000 individuals who took the GED exam, the peak year for test administrations, but only 64 percent successfully earned the

credential (Parsad & Lewis, 2003). Thus, despite the prevalence of GED programs, students hoping to receive their high school equivalency certificate by completing the GED are faced with numerous barriers. For example there have been recent declines in financial support at the program level. Nevertheless, community colleges continue to take a central role in providing programs and support to this population of students (WSBCTC, 2001).

In a small sample study to identify factors supporting student progress in GED programs, Smith and Locke (1999) studied students at a Midwestern community college. Due to the nature of GED programs and their unitary focus on assisting students to pass the examination, these researchers concluded that the GED programs may not be providing students with the requisite skill sets to continue their education in college. Successful GED graduates who transitioned to college level coursework tended to be older, have more work experience, possess clearer educational goals, be motivated to earn a more advanced degree, possess adequate language skills and be aware of the demands of college-level work. Results clearly pointed to a lack of support from the community college programs for transitions among this population of students. In fact, results highlighted that those students who successfully transitioned did so because of individual rather than institutional variables.

Certificate Only to Degree-Seeking

Included in the array of transitions for community college students is the move from seeking only a vocational or career certificate to the larger goal of a college degree. Typically a community college certificate is awarded for the successful completion of a short, usually occupationally focused, program of study in a specialized area. While the amount of credits or courses for certificates varies widely from as few as one to as many as eight or more courses, many community college certificates are awarded for the successful completion of a program of 18 semester credits. While some courses in certificate programs may articulate directly into associate degree programs or even provide transferable credit, others lead only to a terminally oriented certificate. Using nationally representative data Hoachlander, Sikora, and Horn

(2003) reported that only 10 percent of students enrolled in two-year institutions planned to earn a certificate, while approximately 81 percent of first year students desired to transfer or earn an associate's degree. The literature is silent about the factors that promote the change in focus from a certificate to a degree.

Less than Baccalaureate to Transfer

The shift from the goal of earning less than a baccalaureate degree to a desire to transfer may be viewed as the opposite of the "cooling out" principle. For students making this transition, the community college or other influences contributed to a "warming up" to the goal of earning a bachelor's degree or more. Research by Bers and Smith (1991) indicated that students with clear educational objectives were more likely to persist at the community college than those who were unsure of their futures. A study by Nora and Rendon (1990) of the structural relationships between (1) student background, (2) early commitments, (3) social integration, (4) academic integration, and (5) inclination to transfer found that students who were highly integrated into their college, both socially and academically, were more likely to anticipate transfer. Thus it would appear that community colleges that assist their students to become involved may contribute to the "warm-up" to a baccalaureate.

Methodology – Analyzing the Los Angeles Situation

Sample

Strictly speaking, these analyses were not of a sample of students, but rather a population. Our initial analyses included *all* students who were first time credit enrollees at any one of the district's nine campuses in the fall of 2000 ($n = 29,079$). The students in our study enrolled in a district that serves over 122,000 students, of which 80 percent are students of color. Using almost any definition, the LACCD qualifies as an institution that serves a large proportion of low-income students. Forty percent are non-native English speakers, 25 percent come from homes in which parents received less than a high school education,

and 40 percent are below the federal poverty line. In terms of age, less than a fifth of all students are in the traditional age group. Almost three-fourths of the district attends college part time (Los Angeles Community College District [LACCD], 2003).

Analyses

We conducted a series of transcript analyses working from enrollment records and district demographic files. Transcripts consist of all enrollments by a student over time. Transcript analysis is an iterative process involving the steps and processes of coding, sorting, aggregating and applying results to student-level data. Put another way, when analyzing transcripts, student enrollment is the unit of analyses. Transcript analysis converts the enrollment level data to aggregate measures attributable to a single student.

We coded each English and mathematics course based on required pre-requisites and whether it was transfer level. The longitudinal nature of our data allowed us to trace student patterns of enrollment in the following increments: (a) within the first year, (b) after the first year, (c) after two years, and (d) after three or more years. Similarly, we identified and coded all courses in the ESL curricula and longitudinally traced those enrolled. Finally, we coded and longitudinally tracked students according to their goals and degree aspirations. Specifically, we compared educational goals in the first semester of enrollment (fall 2000) to those expressed in the student's last term of enrollment. For students still enrolled, we used spring 2005 as the last semester of enrollment.

Results

Basic Education to College Level

Table 1 depicts the proportion of students within the district that enrolled in below college level English and mathematics and the proportion that successfully transitioned to college-level curricula. The chart includes only those students who can be described as program-pursuing. We excluded all concurrent high school students, those enrolled in the district's law enforcement academy, students entering the district with an existing degree (AA or higher),

transfers from another college and those who attempted less than 6 units, as well as those that enrolled in only one term. We contend that this study is a population study even though the subsets in each analysis do not contain all students. Rather, each analysis contains students who fit the description of the population. Also excluded were those students who did not enroll in either basic math or English. We describe successful transition as earning a grade of "C" or better in a specific mathematics or English course. These analyses were anchored on English 28 (Intermediate Reading and Composition) because it is the minimum English requirement for the associate level degree. For those students wishing to transfer, English 28 is the pre-requisite for true transfer level English (English 101). Similarly, we chose Math 125 (Intermediate Algebra) as the math anchor because it is one level below true transfer level. Note that while neither anchor course is at transfer level, they do provide college credit toward the associate's degree. More than half of the sample cohort (56%)

enrolled in a below college level course in either English or mathematics. More than one-third (35.6%) of the sample fit our inclusion criteria and enrolled in an English course two levels or more below college level. As the table indicates, after four and a half calendar years approximately one in five students (21.8%) who enrolled in a course at the anchor level had not transitioned to the Associate Degree Applicable level.

Because the developmental structure in mathematics is deeper it necessitated the inclusion of four levels below transfer level (Math 125). The proportion of successful transitions was similar to that of English (78.8%). It is noteworthy that the majority of students who made successful transitions did so in the first year. In both English and mathematics, the pattern is painfully clear – those at the lowest levels of developmental study are much less likely to transition than those who begin their studies closer to the anchor course.

Table 1. Transitions from Basic Skills to Associate Degree Applicable

Transition	Fall 2000 "Program- Pursuing" Cohort	Transitioning to AA Applicable Level				Not Transi- tioning by Spring 2005
		Within 1st year	After 1 year	After 2 years	After 3 or more years	
Basic skills (in either Math or English) to college level	8,194	5,085	746	163	113	2,087
	Percent	62.1	9.1	2.0	1.4	25.5
English (below English 28)	5,216	3,580	354	85	59	1,138
	Percent	68.6	6.8	1.6	1.1	21.8
2 levels below transfer	3,325	2,575	170	43	27	510
	Percent	77.4	5.1	1.3	0.8	15.3
3 levels below transfer	1,891	1,005	184	42	32	628
	Percent	53.1	9.7	2.2	1.7	33.2
Math (below Math 125)	6,428	4,409	488	97	74	1,360
	Percent	68.6	7.6	1.5	1.2	21.2
2 levels below transfer	2,210	1,799	104	13	13	281
	Percent	81.4	4.7	0.6	0.6	12.7
3 levels below transfer	1,556	1,057	137	23	18	321
	Percent	67.9	8.8	1.5	1.2	20.6
4 levels below transfer	2,662	1,553	247	61	43	758
	Percent	58.3	9.3	2.3	1.6	28.5

English as a Second Language

Table 2 provides the proportion and pattern of transition for ESL entrants into academic English programs. Students enrolled in adult basic ESL were not included in the analyses. About 12.9 percent of the total population was enrolled in ESL classes in the fall of 2002. The proportion of these students who made successful transitions after four and one-half years was about 60 percent. While most successful transitions occurred within the first year, many students required a much longer time span.

Goals

One of the least understood areas of student progress is the frequency with which community college students make transitions to goals. In the LACCD, students are asked their goals not only at initial entry

to the district but also at each term of registration. The question of current goal is part of the term registration form. Table 3 compares students' initial goals to their stated goals in their last term of attendance. The column, row, and cell percentages tell the story of change and transition. The most significant transition occurred within the group with the original goal of "Personal development," where 10.6 percent of the students in that group transitioned to other goals, mainly "Career oriented" (3.6%) and "Transfer" (3.1%). The second largest change occurred within the group with the initial goal of "Maintain certificate or license" where 9.5 percent transitioned to other goals, the largest proportion of whom shifted to "Career oriented" goals (3.6%), presumably the effect of pursuing other employment-related skills. Nearly 10 percent of the group (9.4%) became more decided during their enrollment spans; 3.9 percent

Table 2. Transitions from ESL to Academic English Classes

Type of Transition	Fall 2000 Program-Pursuing Cohort <i>N</i>	Transitioning to Academic English									
		Within 1st year		After 1 year		After 2 years		After 3 or more years		Not Transitioning by Spring 2005	
		<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%
ESL to regular curricula	1,883	711	37.8	240	12.7	112	5.9	61	3.2	759	40.3

Table 3. Transitions from Initial Goals to Final Goals

Initial Educational Goal	Final Educational Goal																	
	Unknown / Undecided		Career Oriented		Degree or Certificate Only		Transfer		Maintain cert or license		Basic Ed		Personal development		Total			
	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%	<i>N</i>	%		
Unknown/Undecided	9	2.2	15	3.6	3	0.7	13	3.1	2	0.5	2	0.5	370	89.4	414	10.6	19.9	
Career Oriented	13	1.2	38	3.4	11	0.9	28	2.5	1	0.1	1029	91.3	7	0.6	1,127	8.7	34.1	
Degree or Cert Only	2	0.7	10	3.6	4	1.5	5	1.8	249	90.6	5	1.8	1	0.4	275	9.5	7	
Transfer	67	1.7	65	1.7	43	1.1	3687	94.8	13	0.3	5	0.1	9	0.2	3,889	5.2	26.6	
Maintain cert or license	27	2.6	26	2.5	936	91.4	28	2.7	5	0.5	0	0	2	0.2	1,024	8.6	1.9	
Basic Ed	91	1.8	4637	92.9	58	1.2	147	2.9	17	0.3	14	0.3	23	0.5	4,987	7	7.7	
Personal development	2,643	90.6	96	3.3	34	1.2	115	3.9	10	0.3	10	0.3	9	0.3	2,917	9.4	2.8	
Total	2,853	19.5	4887	33.4	1089	7.4	4023	27.5	297	2	1064	7.3	421	2.9	14,633	8.6	100	

transitioned to "Transfer" while 3.3 percent transitioned to "Career oriented." Only 5 percent of the students with an initial "Transfer" goal subsequently shifted their focus to other areas, suggesting that transfer students arrive at community colleges with a focus that is not often deterred. While some students do transition, it is clear that most students (about 90% or more) retain their initial goals from the beginning until the last term. These data belie some of the mythologies about community college students changing their goals in an almost random fashion. More granular analyses were performed on these data than are presented here. These are available upon request of the authors.

Conclusions and Recommendations

The purpose of this article is to provide a snapshot of the type and magnitude of student transitions within the community college. Although the data represent only one district, the longitudinal and inclusiveness of population data may be instructive to other districts that are similar to Los Angeles in demographics or curricular offerings. They provide an initial benchmark for further research in the area of student transitions.

Community colleges have often been called opportunity colleges, learning centers, and second chance institutions. However the pathways of opportunity and new academic achievements generally wind through transitions producing significant personal and academic changes. Unlike most four-year colleges and universities that exercise their privilege of establishing admissions criteria that bar many from entering, community colleges generally have an open admissions policy that invites all who may benefit to enroll. Thus, the colleges host some students who are academically ill-prepared to progress toward their goals, others whose goals are poorly formed, and still others who through exposure to courses or concerned faculty and administrators, will experience a metamorphosis of youthful irresponsibility into adult responsibility. Whatever the impetus, for many community college students the path to success requires intra-college transitions.

As seen by the analyses herein presented, transitions within the community college are not rare. Yet despite their prevalence, the outcomes of transitioned students have rarely been addressed by the literature. Even more troubling is that these movements are not acknowledged or celebrated. The student, who progresses from the ESL ranks to college level English, from the depths of remediation to college level mathematics, or from one goal to another, generally does so in isolation and silence. In many cases, even the student her/himself does not realize that a significant transition has occurred.

Another way of looking at the situation is a "truth in advertising" approach. Students should be informed of the transitions that loom ahead between their current status and that of their goals. For purposes of morale or even retention, it may be helpful to inform and congratulate students as they successfully transition. While ceremonies and diplomas may not be in order, a document or other tangible acknowledgment might spur students to continue to transition to success.

In many ways, celebrating transitions is a way to "divide and conquer" the span between the academic position of students when they enter the college and that when they leave. We close with a quote from the feminist poet Audre Lorde (1984): "In our world, divide and conquer must become define and empower" (p. 112). We propose defining transitions and providing the means so that students can be empowered to progress.

References

- Adelman, C. (1998). The kiss of death? An alternative view of college remediation. *National Crosstalk*, 6(3), 11.
- Astin, A. (1998). Remedial education and civic responsibility. *National Crosstalk*, 6(3), 12-13.
- Bellis, D.D. (2004). *Public community colleges and technical schools: Most schools use both credit and noncredit programs for workforce development* (Publication 2004-10-00). Washington, DC: U.S. Government Accountability Office. (ERIC Document Reproduction Service No. ED483230)
- Bers, T.H., & Smith, K.E. (1991). Persistence of community college students: The influence of student intent and social integration. *Research in Higher Education*, 32(5), 539-556.

- Blumenthal, A.J. (2002). English as a second language at the community college: An exploration of context and concerns. In T.H. Bers & H.D. Calhoun (Eds.), *New Directions for Community Colleges: Vol. 117, Next Steps for Community College* (pp. 45-53). San Francisco: Jossey-Bass.
- Brint, S., & Karabel, J. (1989). *The diverted dream*. New York: Oxford University Press.
- Burley, A., Cejda, B., & Butner, B. (2001). Dropout and stopout patterns among developmental education students in Texas community colleges. *Community Colleges Journal of Research and Practice*, 25(1), 767-782.
- Cantone, K.A. (2001). The Rx for remedial college math: Learning communities. *Research and Teaching in Developmental Education*, 18(1), 66-70.
- Clark, B. (1960). The "cooling out" function in higher education. *American Journal of Sociology*, 65, 569-576.
- Davis, J.L. (1999). *Developmental course-taking in community colleges*. Unpublished manuscript, University of Illinois at Urbana-Champaign. (ERIC Document Reproduction Service No. ED430624)
- Dougherty, K. (1994). *The contradictory college*. Albany, NY: SUNY Press.
- Ellis, P. (1999). Standard bearer: Report on the community college employment standards task force. *TESOL Matters*, June-July.
- Grubb, N. (1991). The decline of community college transfer rates: Evidence from national longitudinal surveys. *Journal of Higher Education*, 62(2), 194-222.
- Hadden, C. (2000) The ironies of mandatory placement. *Community College Journal of Research and Practice*, 24(10), 823-838.
- Hoachlander, G., Sikora, A.C., & Horn, L. (2003). Community college students: Goals, academic preparation, and outcomes. *Education Statistics Quarterly*, 5(2) [Electronic version]. http://nces.ed.gov/programs/quarterly/vol_5/5_2/q4_1.asp
- Hurb, W.M. (1990). The "1.5 generation" a paragon of Korean-American pluralism. *Korean Culture*, 11(1), 21-31.
- Kirsch, I.S., Jungeblut, A., Jenkins, L., & Kolstad, A. (2002). *Adult literacy in America*. (Publication No. NCES 1993-275). Washington, DC: United States Department of Education, National Center for Education Statistics.
- Lewis, L. & Farris, E. (1996). *Remedial education at higher education institutions in fall 1995* (Publication No. NCES 97-585). Washington, DC: United States Department of Education, National Center for Education Statistics.
- Los Angeles Community College District, (2003). *Los Angeles community college district fast facts*. Retrieved on August 31, 2005 from http://www.laccd.edu/about_us/fast_facts.htm
- Lee, S.J. (2001). More than "model minorities" or "delinquents": A look at Hmong-American high school students. *Harvard Education Review*, 71, 505-528.
- Lorde, A. (1984), *Sister outsider: Essays and speeches by Audre Lorde*. Trumansberg, NY: The Crossing Press.
- Maxwell, W., Hagedorn, L.S., Cypers, S., Lester, J., & Moon, H. (2004, April). *Fragmentary cohorts, full cohorts, and the placement/course level match in remedial mathematics courses among urban community college students*. Paper presented to the annual meeting of the American Educational Research Association, San Diego, CA.
- Merisotis, J.P., & Phipps, R.A. (2000). Remedial education in colleges and universities: What's really going on? *The Review of Higher Education*, 24(1), 67-85.
- Nora, A., & Rendón, L.I. (1990). Determinants of predisposition to transfer among community college students: A structural model. *Research in Higher Education*, 31(3), 235-255.
- Oudenhoven, B. (2002). Remediation at the community college: Pressing issues, uncertain solutions. In T.H. Bers & H.D. Calhoun (Eds.), *New Directions for Community Colleges: Vol. 117, Next Steps for Community College* (pp. 35-44). San Francisco: Jossey-Bass.
- Parsad, B. & Lewis, L. (2003). *Remedial education at degree-granting postsecondary institutions in Fall 2000*, (Publication No. NCES 2004-010). Washington, DC: United States Department of Education, National Center for Education Statistics.
- Perin, D. (2002). The location of developmental education in community colleges: A discussion of the merits of mainstreaming vs. centralization. *Community College Review*, 30(1), 27-44.
- Rance-Roney, J. (1995). *Transitioning adult ESL learners to academic programs*. Washington, DC: National Center for ESL Literacy Education. (ERIC Document Reproduction Service No. ED385173)
- Rickard, P., Stiles, R. & Jacobsen, J. (2003). *Adult basic education and community colleges in five states: A report from the comprehensive adult student assessment system (CASAS) to the council for advancement of adult literacy*. Retrieved on September 1, 2005 from <http://www.caalusa.org/casasworkingpaper.pdf>
- Sessoms, D.M. & Taylor, R.G. (1997). Predicting student success in a community college GED program. *College Student Journal*, 31, 423-8.
- Shinn, H.B., & Bruno, R. (2003). *Language use and English speaking ability: 2000* (Census 2000 brief). Washington, DC: U.S. Bureau of the Census.
- Smith, M.C. & Locke, S.G. (1999). From GED to college: Perspectives, practices, and goals of GED students and GED recipients. *Research and Teaching in Developmental Education*, 16(1), 49-55.
- Shults, C. (2000). *Remedial education: Practices and policies in community colleges* (Research Brief No. AACC-RB-00-2). Washington, DC: American Association of Commu-

nity Colleges. (ERIC Document Reproduction Service No. ED448811)

Spann, M.G., Jr. (2000). *Remediation: A must for the 21st century learning society*. Retrieved September 1, 2005, from http://www.communitycollegepolicy.org/pdf/3347_Spann_remediation.pdf

Sticht, T. (1990). Adult literacy education. *Review of Research in Education*, 15, 59-74.

Washington State Board for Community and Technical Colleges (WSBCTC). (2001). *Enrollments, student characteristics, progress and success for basic skills students in state support instruction in community and technical colleges*. Retrieved September 18, 2005, from <http://www.sbctc.ctc.edu>

Wrigley, H.S. (1993). Adult ESL literacy: Findings from a national study. *ERIC Digest*, 5, 3-4.

Linda Serra Hagedorn, Ph.D., is professor and chair of Educational Administration and Policy in the College of Education at the University of Florida, PO Box 117049, Gainesville, FL 32611-7049, phone: 352.392.2391 x263, email: hagedorn@coe.ufl.edu

George M. Prather, Ph.D., is the senior research scientist at the Los Angeles Community College District, 770 Wilshire Boulevard, Los Angeles, CA 90017, phone: 213.891.2054, email: prat heg@laccd.cc.ca.us