TESTING SEGMENTED ASSIMILATION THEORY: EVIDENCE FROM THE ADD HEALTH STUDY*

Yu Xie

Emily Greenman

University of Michigan

^{*} Paper prepared for presentation at the 2005 Population Association of America Annual Meeting (April, Philadelphia). Direct all correspondence to Yu Xie (e-mail: <u>yuxie@umich.edu</u>) or Emily Greenman (e-mail: <u>egreenma@umich.edu</u>) at Population Studies Center, Institute for Social Research, 426 Thompson Street, University of Michigan, Ann Arbor, MI 48106.

TESTING SEGMENTED ASSIMILATION THEORY: EVIDENCE FROM THE ADD HEALTH STUDY

Segmented assimilation theory is based on the recognition that American society is now extremely diverse and segmented, with an underclass residing in central cities where a large portion of new immigrant families first settles upon arrival. Thus, it is argued that there exist divergent assimilation paths for new immigrants. These paths include conventional upward, or "straight-line," assimilation, downward assimilation, as well as "selective acculturation."

Despite its potential to replace the old assimilation paradigm in sociological studies of immigrants, segmented immigration theory, as it has been articulated in the existing literature, is actually a broad theoretical perspective rather than a middle-range theory subject to empirical tests. In this paper, we critique the theory as it is currently understood and propose a refined version of the theory that yields hypotheses directly falsifiable. We further test the empirical implications of the theory with data from the Add Health study.

We begin with an observation that segmented assimilation theory in essence is a theory about interactions between micro-level assimilation processes and macro-level community contexts. For the sake of illustration, we discuss two types of communities, low SES and high SES, and two types of assimilation outcomes, full assimilation and partial assimilation (which is called "selective acculturation"). In reality, there are continuous gradations in both dimensions. Let us examine the following 2x2 table:

Assimilation Experience	Community Context	
	High SES	Low SES
Full Assimilation	A (Path 1)	B (Path 2)
Partial Assimilation	C (Path 3)	D (Path 3)

Table 1: Interaction between community context and assimilation behavior

In Table 1, there are four groups of immigrant children depending on assimilation experience and community context. The two different columns reflect the view that contemporary America is a

diverse—i.e., segmented—society. Given immigrants' own diverse socioeconomic backgrounds, some of them settle in high-SES communities, whereas others live in low-SES communities. Within each type of community, it is further assumed that assimilation is an attribute that differentiates some immigrant children from others. In this study, we employ different operationalizations of assimilation. It is assumed that the sorting process of individuals into the different cells is a given condition external to our study. To reiterate, we do not study the processes of segmented assimilation. Instead, we are interested in whether the different assimilation paths lead to disparate outcomes.

Based on this classification of Table 1, let us now discuss the implications of segmented assimilation theory for immigrant children's outcomes.

<u>Group A</u>: Immigrant children who live in a high SES community are fully assimilated into the community. Group A follows the assimilation path described by classical assimilation theory, called Path 1 in our discussion of the segmented assimilation literature.

<u>Group B</u>: Immigrant children who live in a low SES community are fully assimilated into the community. However, because low SES inner-city communities offer "oppositional" cultural models, in addition to other possible cultural models, acculturation in this context could lead to "downward assimilation" (Path 2).

<u>Groups C and D</u>: Immigrant children are only partially assimilated into the community. They still retain certain aspects of the culture of origin but have learned what is necessary to do well in school. This path of assimilation is called "selective acculturation," or Path 3. The difference between Group C and group D lies in community context: while children in Group C live in a high SES community, children in Group D live in a low SES community. In Portes and Zhou's original formulation, segmented assimilation theory emphasizes the value of retaining the culture of origin for immigrants who live in low SES communities. However, there is no a priori reason (nor was any given by Portes and Zhou) why selective acculturation cannot be true for immigrants who live in high SES communities. The real difference is that retaining the culture of origin is essential for group D but may be optional for group C (a point to be

2

discussed later), as it protects immigrant children in unfavorable social contexts from downward assimilation into the underclass.

We now proceed to discuss the impact of the different assimilation paths on immigrant children's outcomes. Let Y denote a positive outcome for an immigrant child. For example, Y could be a measure of academic performance. There is an average of Y for immigrant children in each of the cells of Table 1. Thus, we have Table 2:

Assimilation Experience	Community Context	
	High SES	Low SES
Full Assimilation	Y _a (Path 1)	Y _b (Path 2)
Partial Assimilation	Y_c (Path 3)	Y_d (Path 3)

Table 2: Average of Y by community context and assimilation behavior

Based on segmented assimilation theory, we can now make some predictions a priori about the average of Y for the four groups. All of our statements are predicated on the assumption that the groups are otherwise identical in other relevant attributes. If they are not, differences in other attributes should be controlled for statistically in a multivariate analysis. In other words, the following statements are about group differences within levels of other covariates.

<u>Prediction 1</u>: $Y_a > Y_b$. Because Group A lives in a more favorable community context than Group B, the outcome for Group A should on average surpass that of Group B, everything else being equal. Given this,

$$Y_a - Y_b = r_1 > 0.$$
 (1)

<u>Prediction 2</u>: $Y_c > Y_d$. This relationship is analogous to Prediction 1, because Group C lives in a more favorable community context than Group D. Similarly to equation (1), we have

$$Y_{c} - Y_{d} = r_{2} > 0.$$
 (2)

<u>Prediction 3</u>: $r_2 < r_1$. This is true because, according to segmented assimilation theory, retaining the culture of origin protects immigrant children from the influences of the community context so that outcome differences attributable to community SES are smaller for immigrant children who are

3

partially assimilated than for those who are fully assimilated. Now let us take the difference of the differences:

$$r_1 - r_2 = s > 0.$$
 (3)

The quantity s is of central interest to segmented assimilation theory. If s > 0, there is evidence in support of the theory. We call equation (3) the difference-in-difference estimator of segmented assimilation effect.

Predictions 1 through 3 are row-wise comparisons. We can also make column-wise comparisons. The column-wise comparisons give us a different perspective, although the information about the difference-in-difference estimator (i.e. equation 3) is the same.

<u>Prediction 4</u>: $Y_d > Y_b$. That is to say, in a low SES community context, it is better to be partially assimilated than to be fully assimilated. This statement is at the heart of segmented assimilation theory. Let us take the difference between the two:

$$Y_b - Y_d = c_2 < 0.$$
 (4)

However, segmented assimilation theory is vague about whether or not delayed or limited acculturation (Path 3) may also be beneficial or not for immigrant children living in favorable community contexts. That is, we do not know whether $Y_a > Y_c$ or $Y_a < Y_c$. However, the theory clearly predicts that we should see less of a gain from following Path 3 for immigrant children in high SES communities than we do for those who live in low SES communities. To see this, let us define c_1 as:

$$Y_a - Y_c = c_1$$

It is easy to show that

$$s = r_1 - r_2 = (Y_a - Y_b) - (Y_c - Y_d) = (Y_a - Y_c) - (Y_b - Y_d) = c_1 - c_2 > 0.$$
(5)

Because $c_2 < 0$ (equation 4), equation (5) states that segmented assimilation allows a range of possible scenarios for the effect of full assimilation on immigrant children living in privileged environments: they either benefit from full assimilation or at least do not suffer from full assimilation to the same extent as immigrant children living in low SES communities. That is to say, although we cannot determine *a priori* from theory the relationship between Y_a and Y_c , we know that their relationship is bounded somehow by equation (5).

In fact, knowing the relationship between Y_a and Y_c will greatly improve our ability to make predictions and thus sharpen segmented assimilation theory. Let us consider three possible scenarios. <u>Scenario 1</u>: $Y_a = Y_c$. That is, given a high SES community context, there is no difference between partial assimilation and full assimilation. In this case, our difference-in-difference estimator is

reduced to the difference in the second column, differences between partial assimilation and full assimilation among immigrant children living in a low SES community:

$$s = s_0 = -c_2 = Y_d - Y_b$$
 (6)

 s_0 denotes a special quantity of s, as the baseline.

<u>Scenario 2</u>: $Y_a > Y_c$. This is the situation where immigrant children living in a high SES community benefit from full assimilation (Path 1). In this case,

$$\mathbf{s} > \mathbf{s}_{0.} \tag{7}$$

<u>Scenario 3</u>: $Y_a < Y_c$. This is the situation where immigrant children living in a high SES community are disadvantaged from full assimilation (Path 1), just as immigrant children living in a low SES community, albeit at a smaller magnitude. In this case,

$$0 < s < s_0. \tag{8}$$

The three scenarios have very different substantive meanings. If Scenario 2 is true, partial assimilation is beneficial only for immigrant children facing unfavorable community environments. In this case, a rational decision concerning whether to fully assimilate or not would depend on community contexts. If Scenario 3 is true, partial assimilation is beneficial for all immigrant children, regardless of their local contexts. In this case, selective acculturation would be advisable for all immigrant children. If Scenario 1 is true, whether to fully assimilate or partially assimilate is optional among children living in a high SES community– in the sense that it carries only cultural meanings but does not materially impact their lives.

In sum, in our reformulation, segmented assimilation theory is tantamount to an interaction effect between social context at the macro level and assimilation behavior at the individual or family level. We define the effect of segmented assimilation using a difference-in-difference estimator (equation 3 or 5). In formalizing empirical implications, we find a drawback of segmented assimilation theory: it remains silent on the issue of whether partial assimilation or full assimilation is better for immigrant children living in favorable social environments. We allow a range of possibilities but will come to a conclusion based on our empirical research, thus filling a gap in the theory.

In this study, we use data from the National Longitudinal Survey of Adolescent Health (Add Health). We plan to use a variety of operationalizations measuring assimilation, social context, and outcomes.

References:

Portes, Alejandro and Min Zhou. 1993. "The New Second Generation: Segmented Assimilation and Its Variants." *Annals of the American Academy of Political and Social Sciences* 530: 74-96.