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DEMAND AND SUPPLY FACTORS OF
BLACK AGRICULTURAL ECONOMISTS

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Dewitt Jones, Mack Nelson, and Alfred L. Parks

A review of the economics and agricultural economics literature over the past twenty years revealed that considerable attention has been given to the demand, supply, and market for economists and agricultural economists (Boddy; Harmon; Clague and Levine; Helmberger; and Strauss and Tarr). However, much of the work, until fairly recent, has focused on the demand, supply, and market for all economists and agricultural economics with very little attention given to how sex and/or race may differentiate the "produce". That is, the majority of these studies, tend to treat economists and agricultural economists as homogenous products and the market as perfectly competitive. Recent studies on the role and status of women in the two professions report findings which suggest that, at least in the view of buyers, male and female members of the two professions are viewed as differentiated products (Reagan; Lee; Redman; Lane; and Offutt).

This article is an attempt to add to the body of knowledge on this subject. Presented below are preliminary findings of demand and supply factors of black agricultural economists. Unlike similar past studies on this subject, which looked at current and past situations, the focus of this study is on the future demand and supply of black agricultural economists represented by black agricultural economics graduate students. However, information on white graduate students is used as a point of reference and for comparison purposes.

Methodology and Data

To obtain information on supply and demand factors of future black agricultural economists, questionnaires were mailed to the department chairmen of all land-grant universities offering a graduate program in agricultural economics. The chairmen were asked to distribute the questionnaire to all black graduate students in their departments and to five non-black graduate students of U.S. citizenship. Thus, the attempt was to survey the population of black agricultural economics graduate students and obtain a sample, though not scientific, of their non-black counterparts. A total of 136 agricultural economics graduate students responded to the survey. Of this number, 25 were black, 103 were white, and 8 others classified themselves in 5 other race/ethnic groups. Because of the small number of other race/ethnic groups responding, only results for black and white agricultural economics graduate students (hereafter referred to as graduate students) will be reported here.

Supply Factors

The future supply of black agricultural economists depend on a number of interrelated factors. Among the more important ones are their willingness and opportunity to acquire the prerequisite education and training, background and encouragements by those they admired and respected during the early period of their lives, perception of career opportunities in the field, and perception of barriers to entering and advancing in the field.

Education and Training

Of the responding black graduate students, 60% received their undergraduate degrees from predominantly black institutions compared to only 1% of their white counterparts (Table 1). Admittedly, the relative importance of predominantly black institutions in supplying future black agricultural economists is lower than had been expected, given the institution of undergraduate training of the current stock of black agricultural economists. However, the proportion receiving their undergraduate training from predominantly black institutions is still disproportionately higher than the proportion of college students educated by predominantly black institutions in this country. With respect to areas of undergraduate degree, 25% of black graduate students received their B.S. degree in agricultural economics and 20.8% received their degree in economics. For white graduate students the comparable figures are 35.0% and 14.7%, respectively. Thus, slightly over 50% of both black and white graduate students responding received their undergraduate training in some field other than agricultural economics or economics. Although they were not asked to specify the other fields, it is suspected that a large percentage was in some field of agriculture. The findings do suggest, however, that a B.S. degree in agricultural economics is not an overwhelming prerequisite for pursuing a professional career in agricultural economics.

Approximately 80% of both black and white graduate students surveyed were working on a Master's degree. However, slightly over 50% of both groups stated that they expected to complete the Ph.D.

TABLE 1.- Comparison of Educational and Training Characteristics of Black and White Agricultural Economics Graduate Students

	Black ^a (Percent)	White ^b (Percent)
Institution of B.S. Degree		
Predominantly black	60.0	1.0
Predominantly white	40.0	99.0
Undergraduate Degree		
Agricultural Economics	25.0	35.0
Economics	20.8	14.7
Other	54.2	51.0
Graduate Program		
M.S.	79.2	80.6
Ph.D.	20.8	18.4
Expect to Complete Ph.D.	54.2	52.9
Decision to Become an Agricultural Economist		
During high school	8.3	9.8
During college	41.7	52.9
During graduate study	29.2	12.7
While employed	16.7	21.6
Other	4.2	2.9
Factors Influencing Decision		
Farm background	24.0	35.6
College courses	12.0	19.8
Job prospects	32.0	18.8
Interesting/important work	16.0	13.9

Continued (TABLE 1)

	Black ^a (Percent)	White ^b (Percent)
Factors Influencing Decision (Cont.)		
Other	16.0	12.0
Incentives for Pursuing Graduate Degree ^{c,d}		
Pursue career	68.0 (20.0)	78.4 (15.7)
School interesting	20.0 (24.0)	35.7 (45.9)
Undesirable job	40.0 (16.0)	29.3 (28.3)
Job prospects	28.0 (28.0)	18.1 (19.3)
Parental influence	4.0 (16.0)	1.1 (11.2)
Financial Aid Necessary for Graduate Study	75.0	70.2
Area of specialization ^e		
Farm mgt./Prod. econ.	20.0 (4.3)	19.6 (12.2)
Marketing	20.0 (17.4)	17.6 (15.6)
Prices/Income/Policy analysis	12.0 (17.4)	9.8 (17.8)
Int'l trade/Development	20.0 (13.0)	12.7 (11.1)
Agricultural finance	12.0 (13.0)	12.7 (4.4)
Resource economics	4.0 (13.0)	17.7 (11.0)
Research methods/econometrics	8.0 (8.7)	2.0 (10.0)
Other	4.0 (13.0)	7.9 (10.0)

^aN_b = 25; ^bN_w = 103

^cmore than one factor applicable, therefore, figures do not add to 100.

^dnumbers in () represent minor reason.

^enumbers in () represent second area of specialization.

degree (Table 1). Black graduate students listed farm management/production economics, marketing, and international trade/development as their leading areas of specialization. Each was ranked as the major area of specialization by 20% of the respondents. The three leading areas of specialization of the white graduate students were farm management/production economics, 19.6%; resource economics, 17.7%; and marketing, 17.6%. Hence, as the figures in Table 1 shows, there is more similarity than difference between black and white graduate students with respect to areas of specialization. This also holds true for most of the other characteristics.

Motivation and Support

In an effort to get a better understanding of factors influencing blacks choosing, or not choosing, agricultural economics as a profession, they were asked when they decide to major in agricultural economics, the factors influencing that decision, and the incentives for pursuing a graduate degree in the field (Table 1). Of the 25 black respondents, 41.7% decided to major in agricultural economics during undergraduate study, while 29.2% decided during graduate study. For whites, 52.9% decided during undergraduate study and another 21.5% while employed. Less than 10% of both black and white graduate students stated that they decided on agricultural economics during high school.

The two major factors influencing blacks' decision to pursue agricultural economics were job prospects, 32.0% and farm background, 24.0%. For whites, the major reasons were farm background, 35.6% and college courses, 19.8%. College professors, it seems, played

a minor role in influencing both black and white students to pursue the profession. This is interesting in that over 60% of both groups stated that they decided on agricultural economics during undergraduate or graduate study. Parents had little influence on both groups decision to pursue agricultural economics.

Adequate financial support is a necessary ingredient in pursuing a graduate degree. The response of the surveyed students attest to this assertion. Asked if financial aid was necessary in order to pursue graduate study, 75.0% of the black and 70.2% of white graduate students said yes (Table 1). Table 2 shows the percent of black and white graduate students receiving financial aid by sources from and outside the university. The majority of both black and white graduate students received some form of financial assistance from the universities they attended. Research assistantship was the most important university source of financial support received by both black, 60.0%, and white, 67.0%, students responding. Although differences existed between the two groups on the percent and average amounts received from the various university sources, financial assistance seems to be equally available to blacks as to white graduate students.

The same does not hold true for financial assistant outside the university. A considerably smaller percentage of blacks than whites had personal savings, 20.0% compared to 34.9%, and received financial support from parents, 12.0% compared to 25.2%. Although, percentage wise, there was little difference in the percent of blacks and whites with spouse financial support, 12.0 compared to 15.5% ,

TABLE 2.- Sources of Financial Support of Black and White Agricultural Economics Graduate Students

Source	Black ^a		White ^b	
	Percent Receiving ^c	Amount (Dollars) ^d	Percent Receiving ^c	Amount (Dollars) ^d
From university				
Fellow/scholarship	23.0	6,010	18.4	6,314
Teaching asst.	12.0	3,692	8.7	4,717
Research asst.	60.0	6,583	67.0	6,211
Loan	20.0	3,050	20.4	5,886
Grant	0.0	-----	0.0	-----
Outside university				
Savings	20.0	1,821	34.9	1,606
Spouse	12.0	1,583	15.5	9,888
Parents	12.0	1,800	25.2	1,569
Employment	20.0	5,332	13.6	3,491
Other	4.0	4,104	8.0	3,650

^aNo = 25; ^bNw = 103

^cPercentages do not add to 100 because some students received financial support from more than one source.

^dAverage amount received.

the average amount from spouse for blacks, \$1,583, was only one-sixth of the amount average for whites, \$9,888. However, a larger percentage of blacks, 20.0%, than whites, 13.6%, had outside employment and higher average earnings (\$5,332) than their white counterparts (\$3,491). The latter can and oftime does impede completion of one's education.

Barriers

The surveyed students were asked to rank according to importance twelve factors considered barriers to obtaining a graduate degree. As might be expected, the most important problem was finance, ranked first by 60.9% of the black students and 46.4% of the white students. Other major problems listed by both groups were opportunity costs of attending graduate school, inadequate educational background, and time. Heartening to see, race was not considered a major problem by either black or white graduate students.

Demand Factors

To get a better assessment of the demand side of the market, one needs information from blacks who are currently in the market and from employers of agricultural economists relative to their experience with blacks as employees, as well as potential entrants' perception of the market. Unfortunately, information was only available from the latter at the time this article was being prepared. While information on demand factors is incomprehensive, the authors felt that it would be instructive to briefly touch on this issue.

Both groups were, in general, quite optimistic about the future demands for agricultural economists (Table 3). Blacks, however, were less optimistic about career opportunities for blacks at the master degree level than whites but more optimistic than whites at the Ph.D. level. Only 55.0% of blacks perceived the future demand for agricultural economists to be good at the master level compared to 73.6% of the whites who believe that the future demand will be good for master's level agricultural economists. Also, only 57.9% of blacks believed advancement opportunities to be good at the master's level compared to 73.9% of their white counterparts. The low perception by black graduate students about future demand and advancement opportunity at the master's level may be due to their greater familiarity with educational institutions, where a Ph.D. is virtually a prerequisite for advancement, than other employment sectors. Why blacks are only moderately optimistic about future demand is unclear, in that a much larger percentage felt that the availability of jobs would be good in the future. It should be noted that both black and white graduate students were more optimistic about the future for agricultural economists with Ph.D.'s than for those with only a master's degree.

Conclusion

The preliminary findings from the survey of black and white graduate students reveal no significance difference in supply factors between black and white students at the graduate level preparing to enter the profession. Data from blacks in the labor market and

TABLE 3.- Perception of Career Opportunities as an Agricultural Economists by Black and White Agricultural Economics Students by Degree Level

Opportunity	Perceived to be Good	
	Black (Pct.)	White (Pct.)
Master's degree		
Availability of jobs	70.0	70.8
Future demand	73.7	87.6
Geographical mobility	55.0	73.6
Salary	78.9	73.9
Advancement	57.9	73.9
Ph.D. degree		
Availability of jobs	100.0	82.4
Future demand	100.0	94.7
Geographical mobility	87.5	78.1
Salary	100.0	88.6
Advancement	94.1	93.0

^aN_b = 25; ^bN_w = 103.

employers of agricultural economists were not available in time to be included in the findings. Thus, a more comprehensive analysis of demand factors must await the final report of the Ad-Hoc Committee on the Role and Status of Blacks in Agricultural Economics. However, it is worth noting that black graduate students are as equally optimistic about career opportunities in the profession as white.

FOOTNOTES

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REFERENCES

- Boddy, Francis M. "The Demand for Economists," Amer. Econ. Rev. 52(1962): 503-508.
- Boddy, Francis M. "The Market for Economists," Amer. J. Agr. Econ. 55(1973): 720-24.
- Clague, Ewan, and Morton Levine. "The Supply of Economists," Amer. Econ. Rev. 52(1962): 497-502.
- Harmon, Lindsey R. "The Supply of Economists in the 1970's," Amer. Econ. Rev. 61(1971): 311-315.
- Helmberger, John D. "The Market for Agricultural Economists," Amer. J. Agr. Econ. 55(1973): 725-733.
- Lane, Sylvia., "Evidence of Barriers to the Parallel Advancement of Male and Female Agricultural Economists," Amer. J. Agr. Econ. 63(1981): 1025-1031.
- Lee, Linda K. "A Comparison of the Rank and Salaries of Male and Female Agricultural Economists," Amer. J. Agr. Econ. 63(1981): 1013-1018.
- Offutt, Susan E. "Training Agricultural Economists: Are Women Different?" Dept. Agr. Econ. A.E. Res. 82-22, Cornell University, July 1982.
- Reagan, Barbara B. "The Two Supply Curves for Economists? Implications of Mobility and Career Attachment of Women," Amer. Econ. Rev. 65(1975): 100-107.
- Redman, Barbara J. "The Women Who Become Agricultural Economists," Amer. J. Agr. Econ. 63(1981): 1019-1024.

Strauss, R. P. and M. J. Tarr. "Salary Patterns of Agricultural Economists in the Early 1980's." Amer. J. Agr. Econ. 64(1982): 1053-1061.