Response to Commentaries

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In most cases, authors feel privileged to receive even one set of careful comments on a research article. To receive so many responses from such a distinguished group of researchers is an extraordinarily rare event. Obviously, those responses are quite varied, expressing a wide range of views on the contribution of the Berkovec, Canner, Gabriel, and Hannan (BCGH) article. In part, the diversity of opinion surrounding our article—like that of a number of other analyses of lending discrimination—derives from controversy surrounding discussions of this topic. Unfortunately, the differences of opinion expressed by participants in this colloquy cannot be resolved here. However, there is a tendency for the findings and limitations of the research to be obscured somewhat by the discussion. This brief final response is an attempt to restate the goals of the research and to highlight our views concerning the major points of contention.

First, our research is focused solely on discrimination in lending markets. The model and empirical analysis examine a situation in which lenders discriminate against marginally qualified minority applicants by holding them to a higher credit standard than that of similarly qualified majority applicants. This type of discrimination results in a group of rejected minority borrowers who would have been accepted had they been white.

Although much recent research and policy discussion has focused on this type of lending discrimination, other types are possible. As discussed in the BCGH article, many other forms of discrimination would not have the same effect on observed default.

As is appropriate, we have limited our conclusions to an evaluation of systematic discrimination at the margin. Our article does discuss some forms of discrimination that would not be detected by our test (such as random rejections of well-qualified minority applicants or systematic discrimination by only a few lenders). Clearly there are other forms of lending discrimination (such as those discussed by Bradford and Shlay) that we do not discuss. Furthermore, as should be clear to reviewers and readers alike, the BCGH article does not address discrimination in housing, labor, or other markets. Nowhere have we suggested that other types of discrimination are unimportant; they simply are not the focus of this article.

The contribution of our theoretical model is to show—consistent with basic intuition from the economics of discrimination—that the systematic imposition of higher standards for marginally qualified minority borrowers results in improved performance of loans originated in that group. In our model this type of discrimination is shown to improve average performance for minority borrowers at every level of observed creditworthiness. The outcome of improved loan performance in the presence of discrimination is relative to a baseline minority performance level in the absence of discrimination. This baseline non-discriminatory level of loan performance is unobserved.

The analysis in our article derives from the assumption that, in the absence of discrimination and conditioned on observed risk factors, minority and majority borrowers should have equal loan performance. According to the theory, discrimination results in better performance for loans to minority borrowers than for loans to majority borrowers at every level of the observed risk factors, because it demands higher qualification standards for minorities. The empirical finding of higher default rates and default costs for black borrowers is then interpreted as a rejection of the joint hypothesis of equal true default rates in the absence of discrimination and discriminatory underwriting standards.

We have carefully and explicitly stated in our conclusions that if the assumption of equal true default rates is incorrect, our analysis does not imply that race is not used in underwriting decisions. Unfortunately, despite our attempts to clarify these issues, most of the reviewers have focused on the effects of violation of the assumption of equal true default rates.

There is no disagreement about the potential effects of unequal true default rates on observed default rates. Fundamentally, the idea is that if race remains predictive of true default probabilities even after controlling for all observable loan characteristics, the positive shift in observed default rates from discrimination can be masked by the higher overall default rates for the group. These and other major technical issues of the BCGH model are well presented by Brueckner. This issue also underlies the marginal-versus-average borrower critique contained in the Quigley commentary. Note, however (as recognized by Brueckner) that we explicitly address the major technical issues surrounding the analysis—including those of the marginal-versus-average borrower.

In the context of the BCGH model, discrimination changes the unobservable component of creditworthiness for accepted borrowers at the margin; however, comparisons between groups are made, by necessity, in averages. Differences at the margin are implied by differences in the mean only if more information about the underlying distribution is available. While the point is straightforward, note that for the BCGH analysis the relevant marginal-versus-average issue pertains to the unobservables, after controlling for all observed risk factors of borrowers, property locations, and loans. The distribution of observable factors, although indicating the higher overall risk of black borrowers, has no significant effect on our results. A large number of empirical estimates show similar effects of race on default for subsets of high-risk (marginal) borrowers.

As stated in the BCGH article, the empirical finding of higher default for black borrowers is interpreted as being inconsistent with the joint hypothesis of equal true default rates conditioned on observed characteristics and discrimination in the form of higher qualification standards for black borrowers. As discussed in many of the commentaries, this result is consistent with higher true default rates for black borrowers, either with or without some use of race in underwriting at the margin. It is also consistent with the behavior discussed by Bradford and Shlay in which Federal Housing Administration lending discrimination results in decisions to “grant credit to unqualified (minority) candidates.” Clearly our comments, as well as those of the reviewers (except for Bradford and Shlay) have been directed toward the former view, not the latter. However, either viewpoint—or both—could explain the BCGH results.

Our article was never intended to be the last word on lending discrimination, and the fact that the results could be consistent with some lending discrimination does not, in our view, either invalidate our analysis or suggest that analyses of default cannot be used to evaluate discrimination. As discussed by Yezer, understanding default is a necessary step in evaluating appropriate underwriting standards. Although the BCGH results do not prove that lenders do not discriminate, the higher default rates for black borrowers do raise questions about the type and extent of lending discrimination. Additional research efforts are needed to improve the understanding of racial differences in mortgage lending and default patterns. Yezer's comments present several ideas for future efforts, and we hope that our article and the ensuing commentaries will suggest others. Together, we hope that these analyses will help advance public and private efforts to ensure fair and equal access to mortgage credit.