

Impact of Endangered Species Act Standards on Vacant Land Prices in Cherokee County, Georgia

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ETOWAH
aquatic habitat conservation plan



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Introduction

The spatial growth of urban areas is associated with a large number of actual and potential problems. These problems include such things as increased traffic congestion, overburdened public infrastructure, and decreased access to employment opportunities for lower-skilled central city residents. Additionally, since much of the new development that is spawned by the expansion of urban areas into previously rural ones occurs in undeveloped areas, there are a host of environmental concerns associated with such growth such as habitat destruction and air quality impacts.

One area of particular concern is the impact of increased levels of development on the quality of streams and rivers. Studies have documented an effect on both the biotic and abiotic components of the aquatic ecosystem in relationship to urban land cover (e.g. Helms et al, 2009; Schoonover et al, 2006; Wickham et al, 2008). Researchers have collectively classified the urban effect on streams as the “urban stream syndrome,” having “symptoms” of flashier hydrographs, higher pollutant levels, highly modified channel geomorphology and decreased biotic richness than its non-urban counterparts (Walsh et al, 2005).

In response to these urban threats to river and stream quality, state and local governments have sought policy approaches that can preserve river and stream quality while not stifling the ability of newly developing areas to benefit from growth. This can be a delicate balancing act, as regulations that are too stringent or lead to excessively long approval periods can make it difficult for supply to keep up with demand and lead to decreased housing affordability. Several recent studies in urban economics have linked reduced housing affordability with high levels of growth controls (Quigley and Raphael, 2005, Glaeser et al, 2005). At the same time, however, regulations that are too lenient run the risk of allowing new development to negatively impact local environments such as aquatic ecosystems.

This study looks at one particular set of development standards in Cherokee County, Georgia, that have as their primary focus the protection of endangered fish species. The goal is to determine whether the standards impact vacant land values, and, if so, in what direction. The rest of the paper is organized as follows. The next section profiles Cherokee County and the set of policy approaches employed in the county. The following section outlines the data used in the study and provides a summary of the data. Section IV explains the empirical approach employed in the study, and is followed by a section that presents the study’s results. Finally, a concluding section summarizes our findings and suggests areas for future research.

I. Cherokee County and the Etowah Aquatic Habitat Conservation Plan

Cherokee County, Georgia, is located in the Atlanta metropolitan statistical area (MSA). Both the Atlanta MSA and Cherokee County have experienced high rates of growth over the past few decades. Additionally, as the Atlanta MSA has grown, its boundaries have expanded substantially. According to the U.S. Census Bureau, the Atlanta metropolitan area has grown from five counties in 1970 to twenty-eight counties in June 2008. At the same time, the population of Cherokee County has grown from 31,000 in 1970 to almost 204,000 in 2007 (an annual growth rate of 5.2%). In response to this rapid increase in population, the number of housing units in Cherokee County has increased from 9,932 in 1970 to 52,870 in 2000, which is an annual rate of increase of 5.7%. Thus, between 1970 and 2000, an average of over 1,400 new housing units were built per year.

At the same time, Cherokee County is part of the Etowah River watershed, which is home to three fish species (the amber darter, the Etowah darter, and the Cherokee darter) that are protected by the Endangered Species Act (ESA). Because of this protection, it is imperative that the impact of development on river and stream quality be minimized. Currently, developers in Cherokee County deal directly with the United States Fish and Wildlife Service (FWS) to ensure that their development plans do not negatively impact these fish. In attempting to minimize the impact of new development on these fish, development projects in some cases experience approval delays while still facing the possibility of future enforcement actions if the protected fish are harmed. Additionally, the level of scrutiny differs between projects, leading to uncertainty on the part of the developer about what may be required of them during their consultation with FWS.

In order to improve both the protection of the fish and the efficiency of the process for developers, the counties and cities in the Etowah watershed began in 2002 to develop a regional Habitat Conservation Plan (HCP). The HCP accomplishes a number of goals including: 1) to provide sufficient protection for the listed fish in the Etowah watershed as required by the ESA, 2) to reduce the amount of time that developers spend in consultation with FWS by streamlining the regulatory process and 3) to provide both local governments and developers with the assurance that, as long as they follow the rules, they will not be liable for any violation of the ESA. The HCP contains six sets of policies intended to accomplish these goals. A detailed description of these policies is found at www.etowahhcp.org. These policies relate directly to the threats to the fish and include the following categories:

- (1) Stormwater
- (2) Erosion and sedimentation
- (3) Stream buffers
- (4) Road crossings of streams
- (5) Utility crossings of streams
- (6) Water supply planning

Under the HCP, the Etowah watershed is divided up into several Priority Areas based on the degree to which an area is home to species that the HCP is seeking to protect. The performance standards in the stormwater management component of the plan vary according to whether or not a site is in a Priority Area, and the level of priority associated with that area. Priority One Areas contain the most sensitive species protected by the HCP and, for small storms, the stormwater runoff from these sites must not exceed the level that would occur if the sites were a forest. Priority Two Areas contain

species that are slightly less sensitive to development. The stormwater runoff from these sites cannot exceed the amount that would occur if the site were 95% forested and 5% impervious. Priority Three and non-prioritized areas are not affected by these types of stormwater performance standards.

In January of 2006, FWS began recommending that similar standards to those of the HCP be met to avoid take of listed species. Section 7 of the ESA requires all federal agencies to consult with FWS so that projects that use federal money or need federal permits are in compliance with the ESA. Using Section 7 of the ESA, FWS was able to recommend similar standards to the HCP on many projects throughout the entire Etowah watershed, primarily projects that needed a Section 404 Clean Water Act permit for impact to waters of the United States. Because most projects do not need federal permits, the majority of development was not subject to the standards FWS implemented, creating an uneven regulatory environment. In January of 2007, at the request of FWS, Cherokee County started directing all development plans over 10 acres to FWS, who then recommended these plans follow similar standards to the HCP to avoid take under the ESA.

When standards similar to those in the HCP are implemented, one important question is whether or not it will impact land values, and, if so, what is the direction and magnitude of the impact. In this case there is no obvious *a priori* assumption regarding the existence, direction, and magnitude of the impact. One hypothesis is that the stringent stormwater runoff standards for Priority One and Two Areas place increased restrictions on developers, making such sites less attractive to developers, and negatively impact the value of sites. However, in addition to protecting fish species, the standards found in the HCP should increase the overall quality of rivers and streams in the Etowah basin. This, then, could, conversely, increase the amenity value of sites in the area and make them more desirable to potential homebuyers. If this is the case, then developers should be willing to pay more for these sites, and the values of affected sites will increase in response to the HCP and the standards recommended by FWS. Finally, many of the techniques to meet the HCP's stormwater management performance standards fall under the broader category of low impact development or better site design practices. In some cases, these forms of development have been shown to save developers money through decreased infrastructure costs, which would lead to increased site values.

This study uses data on sales of unimproved land to determine whether or not FWS's recommended standards, which are similar to those found in the HCP, had an impact of land values in Cherokee County, and, if so, the direction and magnitude of the impact. The next section describes that data that is used in the study and the following sections explain our empirical approach and presents our results.

II. Data

The data for this study are drawn from the Cherokee County, Georgia, tax assessor's database and include all sales of unimproved land in the county from January 1995 until December 2008. The dataset employed in the study includes 1,144 sales of unimproved land. Two separate samples are employed in the study. The first and larger sample includes all parcel sales from January 1995 to December 2008. Because implementation of the standards only began in January 2007, one concern is that the results will be influenced by the fact that the post-implementation period (2007 and 2008) is so short relative to the pre-implementation period (1995 through 2006). In order to control for this, a smaller sample is created in which the pre-implementation period (2005 and 2006) is as long

as the post-implementation period (2007 and 2008). The variable names and descriptive statistics for the sample are contained in Table 1. Finally, all sale prices have been adjusted so that they are stated in 2000 values.

The goal of this study is to determine what impact, if any, the standards recommended by FWS had on vacant land values. The basic empirical approach is to estimate a hedonic model that will test for differences in the value of affected land before and after the implementation of the standards. Thus, the first step is to identify those property characteristics that are expected to affect property values and for which data are available. From the sales record, we are able to identify these variables:

ACRES	Lot size in acres
AG	Indicator variable for parcels that are zoned for agricultural use at the time of the sale
RES	Indicator variable for parcels that are zoned for residential use at the time of the sale
OTHER	Indicator variable for parcels that are zoned for a use other than agricultural or residential at the time of the sale.
BG	Parcel within the town limits of Ball Ground
CAN	Parcel within the town limits of Canton
HS	Parcel within the town limits of Holly Springs
MP	Parcel within the town limits of Mountain Park
NEL	Parcel within the town limits of Nelson
WAL	Parcel within the town limits of Waleska
WOOD	Parcel within the town limits of Woodstock

Following work by Colwell and Sirmans (1978), we expect that sale price will increase at a decreasing rate with respect to lot size. Additionally, it is expected that land zoned for agricultural use will have the lowest value while land zoned for uses other than agricultural and residential uses will have the highest value. Finally, it is expected the parcels within town limits will be more valuable than land outside of town limits, and that parcels within the larger towns (Canton and Woodstock) will be especially valuable.

Next, through the use of Geographic Information Systems (GIS) data and methods we are able to identify the following variables:

LAKE	Indicator variable for parcels adjacent to lakes
DISTATL	Euclidean distance (in 1,000s of feet) to Atlanta city limits
DISTCAN	Euclidean distance (in 1,000s of feet) to Canton city limits
DIST575	Euclidean distance (in 1,000s of feet) to Interstate 575

We expect that lakefront parcels will have higher values than those that do not offer this amenity, and that property values will increase with access to Atlanta, Canton, and Interstate 575.

Finally, a variety of variables are needed to identify those parcel sales that were affected by the development policies. First, the indicator variables PRIOR1, PRIOR2, and PRIOR3 identify those parcels that were in the geographic areas identified in the HCP as Priority One, Two, or Three Areas. As was mentioned before, parcels that are identified as being in Priority One or Two Areas face more stringent stormwater runoff standards than other parcels. FWS used specific species occurrence data to determine where standards needed to be met, and the Priority Areas generally correspond to

these locations. Second, the variable POST is an indicator variable for parcel sales that occurred in 2007 or 2008, when standard implementation was active. Finally, the standards reviewed by FWS were primarily for development plans involving parcels greater than 10 acres. Because of this, an indicator variable (LARGE) is included that assigns a value of 1 if the sale involves a parcel of 10 or more acres, and 0 otherwise. Additionally, LARGE is interacted with the PRIOR and POST variables to identify the sales of parcels most affected by the new standards.

III. Empirical Analysis

The hedonic price function that is estimated is:

$$\ln PRICE = \alpha + \beta_1 \ln ACRES + \beta_2 RES + \beta_3 OTHER + \beta_4 CAN + \beta_5 H + \beta_6 WOOD + \beta_7 LAKE + \beta_8 DISTATL + \beta_9 DISTCAN + \beta_0 + \delta_1 PRIOR1 + \delta_2 PRIOR2 + \delta_3 PRIOR3 + \delta_4 POST + \delta_5 LARGE + \delta_6 POST * PRIOR1 + \delta_7 POST * PRIOR2 + \delta_8 POST * PRIOR3 + \delta_9 LARGE * POST + \delta_{10} LARGE * POST * PRIOR1 + \delta_{11} LARGE * POST * PRIOR2 + \delta_{12} LARGE * POST * PRIOR3$$

The dependent variable is the natural log of the sale price measured in 2000 dollars. Since we also take the natural log of ACRES, the coefficient β_1 measures the elasticity of sale price with respect to parcel size. Following Colwell and Munneke (1997), we expect that the coefficient on $\ln ACRES$ will be greater than zero and less than one, indicating that the relationship between sale price and parcel size is concave.

With regard to zoning, the omitted classification is agricultural, so that we expect the coefficients β_2 and β_3 to both be positive, with $\beta_3 > \beta_2$. Since land values are expected to be higher within town limits, we expect the coefficients $\beta_4, \beta_5, \text{ and } \beta_6$ to all be greater than zero.

Next, the coefficients δ_1, δ_2 and δ_3 will reveal whether the parcels in the Priority Areas tended to be higher or lower value parcels. If the coefficients are greater than zero, then the parcels affected by the policies tended to be high value parcels, while a negative coefficient would indicate that they tended to be lower value parcels. Given that land values are expected to appreciate over time, δ_4 is expected to be greater than zero.

Finally, the coefficients δ_5 through δ_{12} will reveal whether the new standards had any impact on the value of affected parcels, and, if so, whether the impact was positive or negative. Theoretically, the impact could be either positive or negative. Given that the enactment of these standards raised the cost of developing these sites, buyers who purchase affected parcels with the intention of developing the sites will be willing to pay less for the parcels. This, then, would be reflected by negative coefficients for these variables.

On the other hand, if habitat preservation is viewed as an environmental amenity and the standards are viewed as increasing the quality of the streams, then the enactment of the standards could

be viewed as increasing parcel quality, which would lead to higher sale prices. In this case, the coefficients would be positive. Thus, in the end, the question of whether the development policies impacted land values, and, if so, in what direction, is an empirical one.

IV. Results

The summary statistics are reported in Table 1 and reveal that the average parcel sale was for a parcel with 7.34 acres and had a sale price of \$236,993 in the complete sample, and 7.55 acres and a sale price of \$290,764 in the reduced sample. Thus, the average price per acre was \$32,288 in the full sample and \$38,512 in the reduced sample. In both samples, 45-47% of the sales were for land that was zoned for agricultural use, 27% of the sales were for land that was zoned for residential use at the time of sale, and 26-27% of the sales were for parcels zoned for something other than agricultural or residential uses. Finally, approximately 19% of the full sample and 25% of the sales in the reduced sample involved parcels within the limits of Canton, Holly Springs, or Woodstock.

The summary statistics results for the GIS factors reveal that approximately 3-4% of the sale parcels in each sample were adjacent to a lake, while the average distances to Atlanta, Canton, and I-575 were 133,000, 23,000, and 22,000 feet respectively for the full sample and 136,000, 23,000 and 22,000 feet for the reduced sample.

The summary statistics relating to the standards reveal that 12-13% of the parcel sales were for parcels of 10 or more acres. Also, 15% and 11% of the parcel sales were for parcels in Priority One Areas, for the full and reduced samples respectively. 38% and 28% of the parcel sales were for parcels in Priority Two Areas, for the full and reduced samples respectively. 26% and 18% of the parcel sales were in Priority Three Areas, for the full and reduced samples respectively. Thus, approximately 79% of the sales in the full sample and 57% of the sales in the reduced sample were in areas that were affected by the new standards.

Additionally, approximately 17% of the sales in the full sample and 42% of the sales in the reduced sample occurred after the implementation of the standards. The results also reveal that approximately 3% of the sales in the full sample and 4% of the sales in the reduced sample involved the sale of parcels in Priority One Areas after the start of implementation; 8% and 11% of the sales, in the full and reduced samples respectively, involved the post-implementation sale of parcels in Priority Two Areas; and 3% and 5% of the sales involved parcels in Priority Three Areas after implementation.

The results of our vacant land pricing model are reported in Table 2. The table contains the results of estimating the model for two different samples. Model (1) estimates the model using the entire 1995-2008 sample. However, there is one concern with this model. Given that the post-implementation era consists only of sales in 2007 and 2008, it is possible that the results of the study will be affected by the dominance of pre-implementation sales. To control for this possibility, model (2) includes only the pre-implementation sales from 2005 and 2006 in order to estimate the model using a more balanced sample.

First, the results for model (1) indicate that the property and location characteristics perform as expected. The coefficient on lot size is 0.39, which indicates that, as expected, value increases with

lot size at a decreasing rate. Properties zoned as residential at the time of purchase do not sell for significantly more than those zoned for agricultural, while those zoned for something other than agricultural or residential sell for more than twice the price of parcels zoned for agricultural uses. The time variable indicates that prices were appreciating at a rate of 0.7% per month on average during the period covered by the sample. The coefficients on the variables indicating that parcels were located within the town limits of Canton, Holly Springs, or Woodstock support the belief that parcels inside town limits sell for more than those outside town limits. Parcels inside Canton sold for a premium of 85% while those in Holly Springs and Woodstock had premiums of 35% and 70% respectively. The premium for lakefront property was 29%. Finally, the access variables do not behave completely as expected. Access to Atlanta matters in that moving 1,000 feet away from Atlanta reduced the selling price by 1.3%. However, moving away from Canton increased the selling price by 0.8% per 1,000 feet and, while the coefficient on the variable measuring access to I-575 was negative, it was not statistically significant at a 10% level.

The rest of Table 2 reveals how the new standards affected land values. First of all, Priority One and Priority Two Areas were in areas in which parcels had higher than average values. Parcels in Priority One areas sold for a premium of 19% while those in Priority Two areas sold for a 15% premium. While the coefficient for Priority Three parcels is positive, it is not statistically significant from zero at a 10% level of significance. Additionally, parcels that sold after the implementation of the new standards did not sell for more than those that sold in the pre-implementation period.¹ The results for parcels that were in the Priority Areas and that sold after implementation began provide no evidence that the implementation of the new standards affected land values in any significant way. While the coefficients on Priority One and Priority Two parcels that sold after implementation began are negative, neither variable has a coefficient that is statistically significant at a 10% level. Finally, the results for the variables interacting LARGE with PRIOR and POST also reveal no statistically significant impact of the development standards on parcel sale prices. None of these variables have a coefficient that is statistically significant from zero.

As was mentioned above, one concern about model (1) is that the pre-implementation sales dominate the sample. As a robustness check, model (2) is estimated using only the sample of sales from 2005-2008. This yields a sample in which the pre- and post-implementation time periods are identical in length.

The results for model (2) are virtually identical to those for model (1). Of all of the variables measuring the impact of standard implementation, only one (POST*PRIOR3) has a coefficient that is statistically significant at a 10% level. Since, unlike Priority One and Two parcels, Priority Three parcels generally face no additional restriction regarding stormwater management, these results provide no evidence of a negative impact on the sale prices of the parcels most affected by the FWS implementation of standards similar to those of the HCP to avoid take under the ESA.

¹ Interestingly, in an earlier version of the study in which only 2007 sales were available for the post-implementation period, this variable had a coefficient indicating that post-implementation sales were 21% higher than those in the pre-implementation period. It is likely that the drastic fall in real estate values wiped out this premium when the 2008 sales were included.

Conclusions

This study has analyzed the impact that standards for development projects in the Etowah watershed had on the value of unimproved land in Cherokee County, Georgia. The study finds no evidence that the standards recommended by FWS had an impact, either positive or negative, on land values in those areas affected by the plan. This result is not particularly surprising, as the plan has components that will affect real estate developers in both positive and negative ways. First of all, the plan raises the bar in certain areas regarding the development practices that will be required to protect river and stream quality. This aspect of the plan may potentially increase development costs and could make affected sites less attractive to developers. However, at the same time the standards attempt to maintain water quality and may improve other environmental amenity features in the landscape. This, then, should make affected sites more attractive than locations that do not contain similar features. Thus, it is not surprising that we do not find a significant impact of the standards on land values in areas that were most affected by the plan. There may be a perception, however, that the additional restrictions would only result in more expensive development, and in this case, that increased development cost is not reflected in lower land values.

In closing, there are a number of caveats that should be presented in interpreting these results. First, and most importantly, the study period analyzed FWS current standards and recommendations that reflect, but do not exactly replicate, HCP standards. The HCP is primarily implemented through local ordinances, which creates a different regulatory framework from the one that was evaluated. In this sense, the current analysis may be considered conservative in that the additional benefits of streamlined permitting are not considered or embedded in the current review process. Second, while this study is able to include two years' worth of post-implementation parcel sales, a follow-up study with two or three additional years of sales data would potentially provide a better evaluation of the impact of the standards, and comparisons after implementation of the HCP would be particularly useful. Third, the implementation of the HCP coincided with the crash in the U.S. housing market. This could have potentially made it very difficult to measure the impact of the implementation of the standards on land values. However, the biggest concern would have been that the study would not have been able to convincingly attribute a decrease in values in the post-implementation period to the onset of the FWS standards, because market forces were also at work. In other words, the market crash should have biased our results toward finding lower sale prices in the post-implementation period. Given that we did not find such a negative impact, the coincidence of the housing market crash and the beginning of FWS standard implementation only strengthens our conclusion that the standards did not negatively impact the value of unimproved land in Cherokee County.

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Table 1: Descriptive Statistics

Variable	Description	Full Sample		Reduced Sample	
		Mean	St. Dev.	Mean	St. Dev.
PRICE	Sale price in 2000 dollars	236,993	607,091	290,764	895,679
ACRES	Lot size in acres	7.34	25.71	7.55	29.93
TIME	Months before December 2007 that parcel sold	45.11	33.22	15.26	10.12
LAKE	Parcel is adjacent to a lake	0.04	0.18	0.03	0.18
AG	Parcel zoned for agricultural use at time of sale	0.47	0.50	0.45	0.50
RES	Parcel zoned for residential sue at time of sale	0.27	0.44	0.28	0.45
OTHER	Parcel zoned for use other than agricultural and residential at time of sale	0.26	0.44	0.27	0.44
PRIOR1		0.15	0.36	0.11	0.31
PRIOR2		0.38	0.49	0.28	0.45
PRIOR3		0.26	0.44	0.18	0.38
POST	Parcel sold after implementation began	0.17	0.37	0.42	0.49
POST1	Interaction term between PRIOR1 and POST	0.03	0.17	0.04	0.20
POST2	Interaction term between PRIOR2 and POST	0.08	0.27	0.11	0.32
POST3	Interaction term between PRIOR3 and POST	0.03	0.18	0.05	0.22
LARGE	Parcel size of 10 acres or more	0.12	0.33	0.13	0.33
LARGEPOST	Interaction term between LARGE and POST	0.03	0.17	0.07	0.25
CAN	Parcel within town limits of Canton	0.09	0.29	0.10	0.29
HS	Parcel within town limits of Holly Springs	0.05	0.23	0.10	0.30
WOOD	Parcel within town limits of Woodstock	0.05	0.22	0.05	0.21
DISTATL	Euclidean distance in 1,000 feet to Atlanta city limits	132.93	29.47	135.58	28.56
DISTCAN	Euclidean distance in 1,000 feet to Canton city limits	23.02	16.71	22.56	17.33
DIST575	Euclidean distance in 1,000 feet to Interstate 575	21.86	15.93	22.42	15.68

Note: The full sample includes 1,144 separate transactions of vacant parcels of land in Cherokee County, Georgia from January 1995 to December 2008. The reduced sample contains 489 transactions from January 1005 to December 2008.

Table 2: Regression Results

Variable	(1) 1995-2008 Sample	(2) 2006-2007 Sample
ln ACRES	0.3912*** (0.0206)	0.3346*** (0.0303)
RES	0.0408 (0.0549)	0.0630 (0.0888)
OTHER	1.0112*** (0.0689)	0.7731*** (0.1205)
TIME	-0.0067*** (0.0007)	-0.0097 (0.0057)
Canton	0.8509*** (0.0831)	0.9038*** (0.1415)
Holly Springs	0.3524*** (0.0999)	0.5504*** (0.1758)
Woodstock	0.6978*** (0.1105)	0.7688*** (0.2190)
LAKE	0.2906*** (0.1051)	0.3378* (0.1766)
DISTATL	-0.0126*** (0.0010)	-0.0112*** (0.0016)
DISTCANT	0.0077*** (0.0017)	0.0058* (0.0028)
DIST575	-0.0016 (0.0019)	-0.0019 (0.0033)
PRIOR1	0.1872** (0.0837)	0.3963** (0.1574)
PRIOR2	0.1534** (0.0704)	0.3069** (0.1333)
PRIOR3	0.0299 (0.0688)	0.2607* (0.1364)
POST	0.0090 (0.1263)	0.0709 (0.1922)
LARGE	0.5173*** (0.0811)	0.5708*** (0.1524)
<i>POST*PRIOR1</i>	<i>-0.1059</i> <i>(0.1854)</i>	<i>-0.3225</i> <i>(0.2348)</i>
<i>POST*PRIOR2</i>	<i>-0.1818</i> <i>(0.1437)</i>	<i>-0.3435*</i> <i>(0.1893)</i>
<i>POST*PRIOR3</i>	<i>0.0630</i> <i>(0.1649)</i>	<i>-0.241*</i> <i>(0.2185)</i>
<i>LARGE*POST</i>	<i>0.4512</i> <i>(0.3093)</i>	<i>0.4962</i> <i>(0.3514)</i>
<i>LARGE*POST*PRIOR1</i>	<i>0.0357</i> <i>(0.3878)</i>	<i>-0.1875</i> <i>(0.4189)</i>
<i>LARGE*POST*PRIOR2</i>	<i>-0.2904</i> <i>(0.3609)</i>	<i>-0.2498</i> <i>(0.3864)</i>
<i>LARGE*POST*PRIOR3</i>	<i>-0.1654</i> <i>(0.4273)</i>	<i>0.0176</i> <i>(0.4567)</i>
Constant	12.5020*** (0.1684)	12.3831*** (0.3109)
R ²	0.6314	0.5791
Number of Observations	1,143	489

