

Farm Labor Trends and Multifamily Housing Demand in Florida

Revised November 7, 2014

Prepared for Florida Housing Finance Corporation
227 N. Bronough St., Suite 5000
Tallahassee, Florida 32301-1329

Prepared by
Shimberg Center for Housing Studies
University of Florida
P. O. Box 115703
Gainesville, Florida 32611-5703

Introduction

Providing safe, affordable housing for Florida's farmworkers has been a priority since the state launched its State Apartment Incentive Loan program in the 1990s. Florida Housing Finance Corporation (Florida Housing) and USDA Rural Development (RD) each provide subsidies to multifamily housing developments that set aside units for farmworkers. Statewide, these programs subsidize 79 farmworker housing developments with 7,243 affordable rental units.

Since 2005, owners of nine multifamily developments have approached Florida Housing to request waivers that would reduce or eliminate set-asides of units for farmworkers, citing low occupancy rates in farmworker units and difficulty in recruiting new farmworkers to live in the units. Separately, USDA has approved temporary or permanent waivers from farmworker set-asides for 19 developments, including one for which a Florida Housing waiver has also been requested. Properties receiving waivers that reduce or eliminate the farmworker set-aside must continue to rent to low-income households. USDA's waivers require that the properties continue to market units to farmworkers and to give them preference for residency; several Florida Housing waivers have also included this requirement.

The purpose of this report is to evaluate farm labor, economic and housing trends in the state that might be leading to a decline in demand for multifamily farmworker housing. Findings are based on meetings and interviews with housing managers and owners, growers, and farm labor advocates and researchers; housing data from the Shimberg Center's Assisted Housing Inventory; labor and economic statistics from the U.S. Census of Agriculture, Bureau of Labor Statistics, and National Agricultural Workers Survey; and a review of literature on recent trends in crops and farm labor demand in Florida.

The study begins with a background section that describes Florida's farmworker housing programs, tenant and unit characteristics in farmworker developments, and other types of subsidized and market-rate rental housing available to farmworkers. The study then examines factors that might be reducing demand for farmworker housing. These include changes in the need for farm labor due to economic conditions and shifts in the types and locations of crops produced; immigration status of workers and the rising use of temporary workers through the H-2A visa program; and the fit between Florida's multifamily housing product and the needs of farmworker households.

Maps, additional supporting tables and a list of stakeholders interviewed are located in Appendix 1.

Characteristics of Farm Labor Housing and Workers in Florida

Farmworker Assisted Housing Programs

Florida Housing and RD together subsidize 79 farmworker housing developments throughout the state, as shown in Map 1 (see Appendix 1). Most of these developments are concentrated in the southern half of the state, with particular concentrations in the citrus and vegetable growing areas of northeast Collier and western Hendry Counties, and the nursery and greenhouse areas of southern Miami-Dade County.

Table 1. Farmworker Developments

	Funder			Total
	Florida Housing	RD	Florida Housing & RD	
Developments	36	28	15	79
Assisted Units	3,043	3,386	814	7,243

Note: Includes developments that set aside some or all units for farmworkers. “Assisted units” refers to all units with affordability restrictions and includes some units without farmworker restrictions at properties that require only a portion of units to be set aside for farmworkers.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory

Florida Housing’s main vehicle for financing farmworker housing is the State Apartment Incentive Loan (SAIL) program. SAIL provides low-interest loans for multifamily development. Under Section 420.5087(3) of Florida Statute, at least 10 percent of SAIL funds are to be reserved for farmworker developments under each notice of funding availability. These developments reserve from 40 to 100 percent of their units for farmworker households. Developments with a farmworker set-aside of at least 80 percent are eligible for higher loan amounts and zero interest loans. Florida Housing also has provided support for farmworker developments through its Demonstration loan program and through one-time funding to address housing needs following the hurricanes that affected the state in 2004 and 2005. A few additional farmworker developments have received financing from the state through the Low-Income Housing Tax Credit and HOME programs but do not have SAIL loans.

RD’s Section 514/516 program provides grants and low-interest loans to finance multifamily housing for low-income farmworkers at on- and off-farm sites. Most Section 514/516 developments also receive project-based rental assistance under RD’s Section 521 program. The rental assistance enables tenants to pay 30 percent of their income for their units, with the remainder of the rent paid to the housing owner by USDA.

The two funders define an eligible farmworker household slightly differently. Florida Housing requires that a farmworker household include at least one person who derived at least 50 percent of income from “planting, cultivating, harvesting, or processing of agricultural or aquacultural products” in the preceding year. USDA calls for the farmworker to have worked “formally” (i.e. not self-employed) in these same activities and either to have derived at least 50 percent of income from farm work or, where actual earnings are not available, to have worked 110 days of farm labor in the last 12 months or an average of 110 days for more than one year. Florida Housing allows farmworkers to qualify under the USDA definition in developments with both Florida Housing and RD subsidies.

Outside of a small number of dormitory-style developments, the Florida Housing and RD farmworker developments operate under rules that are similar to those in the general assisted housing inventory. Tenants live in separate apartments and commit to 12-month leases. Most units carry income restrictions ranging from 40 to 60 percent of area median income. Also, 2,878 of the farmworker units--40 percent of the total--are made affordable to extremely low-income households through more project-based rental assistance.

To date, owners of nine Florida Housing developments have requested waivers that would allow them to rent units to low-income households other than farmworkers. The waivers either reduce or eliminate the farmworker set-aside requirements. Waivers may be granted temporarily or permanently.

Table 2. Florida Housing Developments with Waiver Requests

Development	County	Total Units	Original Farmworker Set-Aside	Status
Manatee Pond	Manatee	40	40% (16 units)	On hold
In the Pines South	Palm Beach	40	80% (32 units)	On hold
Timber Ridge	Collier	34	80% (28 units)	Temporary waiver granted
Sanders Pines	Collier	40	80% (32 units)	Temporary waiver granted
Esperanza Place	Collier	48	100% (48 units)	Request submitted
Highland Palms	Highland	52	40% (21 units)	Request submitted
Whispering Pines	Polk	64	40% (26 units)	Reduced to 15%
Crossings at Cape Coral	Lee	168	40% (68 units)	Permanent waiver
Omega Villas	Gadsden	56	82% (46 units)	Permanent waiver

Source: Florida Housing Finance Corporation

As Map 1 (Appendix 1) shows, waiver requests for Florida Housing properties are concentrated in south central and southwest Florida, areas dominated by seasonal work in citrus and vegetable crops. In contrast, no waivers have been requested for properties in Miami-Dade County, where more year-round work opportunities are available in greenhouse and nursery work.

Individual waiver requests to Florida Housing cite a number of factors for the drop in farm labor and demand for their units, including citrus disease, recent cold winters, competition from newer farmworker developments (Immokalee area), workers' undocumented status and their reluctance or inability to access to subsidized housing, and a mismatch between smaller 1-2 bedroom units and the larger size of farmworker families.

Household and Unit Characteristics in Farmworker Housing

Household Composition

Florida's overall assisted housing inventory serves a mix of tenants including younger individuals and families, elderly households on fixed incomes, and individuals with special needs. Units range from studios for single adults and couples to large family apartments. Most farmworker developments target a narrower spectrum: families with children, with low-wage incomes, in units with two or more bedrooms.

Table 3 compares household and unit composition in the farmworker developments to other Florida Housing and RD developments. Even in comparison to Florida Housing’s developments with a general “family” population, the farmworker developments are more likely to serve larger households with children, and in larger units. In the Florida Housing portfolio, 60 percent of units in farmworker developments have three or more bedrooms, compared to just 34 percent of units in Florida Housing’s family developments. While the programs allow retired farmworkers to qualify for set-aside units, only eight percent of Florida Housing’s farmworker units and 13 percent of RD’s farmworker units include someone age 62 or older.

Table 3 shows that developments with waiver requests look similar in household composition to other farmworker developments. In the Florida Housing inventory, the waiver properties contain a slightly higher concentration of two-bedroom units and fewer three-bedroom units, consistent with the concern that farmworker properties with smaller units are less competitive than those that can serve larger families. However, this pattern does not hold true for RD properties that have received waivers.

Table 3. Household and Unit Composition

Funder	Property Type	Average Household Size	Units by Number of Bedrooms					% Households with Children	% Elderly Households
			Studio	1 BR	2 BR	3 BR	4 or more BR		
Florida Housing	Farmworker	3.3	-	10%	31%	42%	18%	70%	8%
	Farmworker--Waiver Request	3.1	-	11%	38%	33%	18%	67%	8%
	Family	2.5	1%	18%	48%	30%	4%	55%	11%
	All Properties	2.4	2%	23%	45%	27%	3%	48%	19%
RD	Farmworker	3.1	2%	21%	33%	36%	9%	68%	13%
	Farmworker--Waiver Request	3.1	-	5%	44%	42%	9%	69%	16%
	All Properties	2.1	-	41%	44%	13%	2%	40%	32%

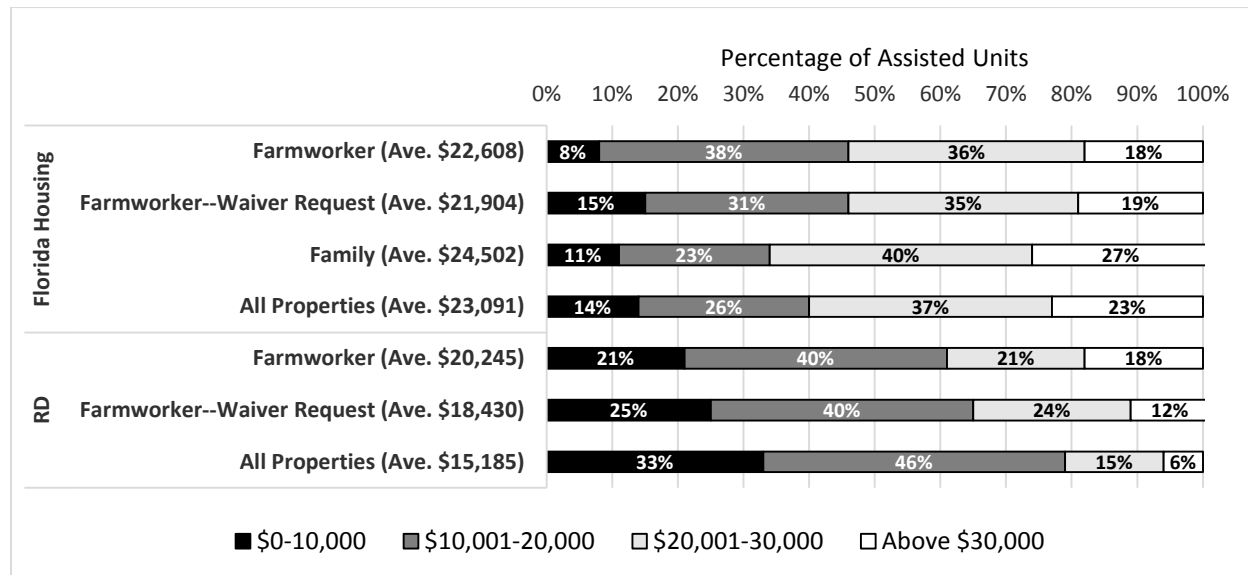
Source: Florida Housing Finance Corporation Tenant Data Reporting System; Shimberg Center for Housing Studies, Assisted Housing Inventory

Household Income

Tenant incomes in Florida Housing’s farmworker developments range from \$10,000 to \$30,000 per year, similar to incomes in the Florida Housing portfolio as a whole. However, the farmworker properties have fewer households at the ends of the income spectrum, below \$10,000 or above \$30,000, compared to the overall portfolio. This reflects the preponderance of working families in low-wage farm jobs in the properties; on the one hand, there are fewer elderly households living on sub-\$10,000 fixed incomes, and on the other hand there are fewer households able to bring in higher earnings from better paying occupations.

Incomes are generally lower in RD properties than in Florida Housing developments. However, incomes in RD’s farmworker units tend to be higher than in the RD portfolio as a whole. This reflects the higher proportion of elderly households and more widespread use of rental assistance in the general RD units.

Figure 1. Household Income



Source: Florida Housing Finance Corporation Tenant Data Reporting System; Shimberg Center for Housing Studies, Assisted Housing Inventory

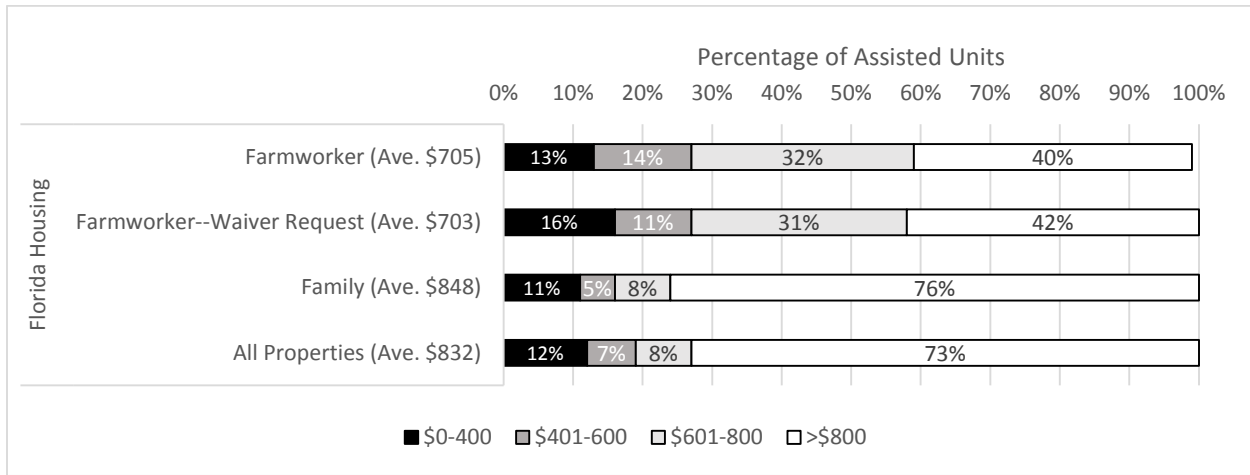
Tenant-Paid Rents¹

Tenant-paid rents in most Florida Housing farmworker units fall in a middle range. Most tenants pay \$400-800 per month for their units. This is similar to the range found in the state’s mid-range affordable developments; that is, those that have financing through programs such as housing credits or SAIL, but that do not have federal rental assistance.

Figure 2 compares the types of Florida Housing properties by tenant-paid rents for three-bedroom apartments, the most common size for farmworker developments. Average rents in farmworker developments are somewhat lower than those in Florida Housing’s inventory as a whole, reflecting their rural locations. Rents of more than \$800 per month are common across the different types of Florida Housing properties, but much more so outside of the farmworker housing portfolio. In the family and “all properties” categories, tenants pay more than \$800 per month in about three-quarters of units. By contrast, the farmworker developments offer more units in the \$600-800 range. There is little difference in rent distribution between the waiver request and other farmworker units.

¹ This section describes the rents paid by tenants to their landlords and any allowance for tenant-paid utilities. It does not include any additional payments to the owners from federal rental assistance, either project-based or vouchers. RD properties are not included because the only dataset available is USDA’s “basic rent” level, which includes both the tenant payment and the amount of federal rental assistance. Because many RD properties have project-based rental assistance, these aggregate amounts greatly overstate the amount that tenants actually pay for their rent.

Figure 2. Rents for 3-Bedroom Units



Source: Florida Housing Finance Corporation Tenant Data Reporting System; Shimberg Center for Housing Studies, Assisted Housing Inventory

Occupancy

Of Florida Housing’s farmworker developments, approximately half (54 percent) have occupancy rates of 95 percent or greater, with most of the remaining properties split between rates of 90-95 percent and 80-90 percent. Similarly, most waiver request properties are divided across the 90-95 percent and over 95 percent occupancy categories; the “11%” values for the 80 percent or less and the 80-90 percent categories each just refer to one property out of the nine total waiver projects.

Florida Housing’s family and overall portfolio is more likely to have occupancy rates over 90 percent than the farmworker projects. Occupancy rates are not available for RD properties unless they also have Florida Housing financing.

Table 4. Occupancy Rates for Florida Housing Developments, November 2013-February 2014

	Occupancy Rate			
	80% or less	80.01-90%	90.01-95%	Greater than 95%
Farmworker (Ave. 93%)	4%	21%	21%	54%
Farmworker--Waiver Request (Ave. 93%)	11%	11%	22%	56%
Family (Ave. 95%)	2%	11%	25%	62%
All Properties (Ave. 95%)	2%	10%	23%	65%

Note: Distribution categories (80% or less, 80.01-90%, etc.) refer to property-level occupancy rates averaged over the November-February period. The average occupancy rate per property type (e.g. 93% for farmworker developments) encompasses the same time period; average across properties is weighted based on the number of units in each development. Source: Florida Housing Finance Corporation, Tenant Data Reporting System

Florida Farmworker Demographics

A key factor in the demand for Florida Housing’s farmworker developments is the fit between Florida’s farmworker community and the characteristics of Florida Housing’s multifamily product. These characteristics include both program restrictions (12-month leases, 50 percent of income from farm

work requirement) and tenant characteristics (family households, rents and incomes in the mid-range of the low-income spectrum). The National Agricultural Workers Survey (NAWS) provides information about Florida’s farmworkers that can help to evaluate this fit, including statistics on migration patterns, household composition, and income.

First, farmworkers may be migrant or non-migrant (sometimes known as “seasonal”), with migrant workers less able to commit to a long-term housing lease. The NAWS defines a migrant as a person traveling more than 75 miles to find farm work. One possible reason for a decline in multifamily housing demand would be a shift from non-migrant workers to a migrant workforce, and from family households to single, unaccompanied workers. In fact, the trend in Florida has been the opposite. Since 2001, shares of single workers and migrants have been falling, and average household sizes have increased slightly. Individual workers are spending more weeks per year on average performing farm work in Florida, consistent with a reduction in migration.

Table 5. Farmworkers by Migrant Status and Household Characteristics, 2001-2012

		2001-2004	2005-2008	2009-2012
Migrant Status	Migrant	54%	37%	27%
	Non-Migrant	46%	63%	73%
Family Status	Single	45%	28%	31%
	Farmworker parent	41%	56%	57%
	Married, no children	10%	12%	11%
	Lives with parents	1% ^a	b	b
	Other	4% ^a	b	b
Average Household Size	All farmworkers	1.7	2.2	2.6
	Migrant	1.2	1.6	1.6
	Non-Migrant	2.2	2.6	2.9
Average Weeks per Year of Florida Farm Work	All farmworkers	36.4	39.7	42

Notes: The NAWS is a survey of a sample of workers, so all estimates are subject to error. Values marked with an “a” have relative standard errors between 31 and 50 percent of the value, and should be interpreted with caution. A “b” denotes an estimate that has been suppressed because there were fewer than four responses or the relative standard error is greater than 50 percent of the value found. Percentages may not total 100 percent due to suppressed values.

Source: U.S. Department of Labor, National Agricultural Workers Survey

While the NAWS sample is too small to differentiate among regions of the state, conversations with interviewees indicate that the increase in stable, seasonal farm work is likely due to growth in nursery and greenhouse work. As discussed later in the paper, the citrus and vegetable growing regions in south central Florida are seeing some recent movement in the opposite direction, with use of single migrant workers under the H-2A visa program increasing sharply. Since much of the H-2A worker increase took place in the past year, this trend is not fully evident from the 2009-2012 NAWS data used here.

Household incomes for farmworkers with children appear to match well with the incomes served by the Florida Housing developments. Most workers with children have incomes in the \$10,000-30,000 range, although substantial numbers report incomes both above and below that range. In contrast, most single

farmworkers earn less than \$20,000 per year. Nearly all workers surveyed (98 percent) reported that they derived more than half of their personal incomes from farm work in the previous year, a key eligibility factor for farmworker multifamily housing.

Table 6. Farmworkers by Household Income and Family Status, 2009-2012

	\$0 - \$9,999	\$10,000 - \$19,999	\$20,000 - \$29,999	\$30,000 - \$39,999	\$40,000 or more
Single	40%	52%	6% ^a	^b	^b
Farmworker parent	16%	28%	31%	12% ^a	14%
Married, no children	11%	42% ^a	^b	14%	19%

Notes: The NAWS is a survey of a sample of workers, so all estimates are subject to error. Values marked with an “a” have relative standard errors between 31 and 50 percent of the value, and should be interpreted with caution. A “b” denotes an estimate that has been suppressed because there were fewer than four responses or the relative standard error is greater than 50 percent of the value found. Percentages may not total 100 percent due to suppressed values. Data suppressed for the “Lives with parents” and “Other” family status categories due to small sample size.

Source: U.S. Department of Labor, National Agricultural Workers Survey

Other Rental Housing Available to Farmworkers

Outside of the Florida Housing and RD farmworker developments, rental housing options for farmworkers include market-rate rental units, assisted housing developments, and migrant labor camps. Maps 2 through 8 (Appendix 1) show the locations of these other types of properties in proximity to the Florida Housing properties with waiver requests. For each of the seven counties with waiver requests, we drew a buffer around the property or properties with waiver requests to find other types of rental housing that might compete with the farmworker developments. Buffer areas were set at 10 miles around the waiver request property in the most rural areas. In more developed areas where a 10-mile buffer would include a large number of multifamily properties, the buffer size was reduced to 5-7 miles around the waiver request property.²

Multifamily Market-Rate and Family Assisted Housing

Table 7 shows average rents for two types of multifamily developments in the buffer areas surrounding the waiver request properties: market-rate developments and assisted developments with a “family” target population. For the market-rate properties, rent data come from phone and Internet research. For the assisted developments, rents come from administrative and compliance records; note that these are actual rents charged to tenants, not maximum rent limits.

Results from the mapping and rent surveys are varied. The more urban coastal counties—Lee, Manatee and Palm Beach—offer large concentrations of market-rate rentals (see Maps 5, 6 and 7). However, in Manatee and particularly Palm Beach County, market-rate properties command rents well above typical assisted housing rent levels. Highlands and Polk Counties also offer a number of market-rate options, particularly near town centers (see Maps 4 and 8). In these less expensive inland markets, rents in market-rate and assisted units are comparable.

² Collier County contains three waiver request properties, all located in Immokalee. The buffer is drawn around the centroid of the three properties.

In contrast, alternatives to the farmworker developments in the more rural areas are mostly limited to family assisted housing developments, with few market-rate options. This pattern is found in the areas surrounding the properties with waivers in Gadsden County (see Map 3) and both waivers and pending waiver requests in Collier County (see Map 2). While Collier County as a whole includes wealthy and populous coastal communities, the farmworker developments with waiver requests are located in Immokalee in the far northeastern corner of the county, at least 25 miles from the developed areas around Naples. To the extent market-rate developments are found in these areas, the rural locations keep rents low and comparable to rents in the assisted properties, as shown in Table 8.

Table 7. Average Actual Rents in Market-Rate and Assisted Family Developments, Waiver Request Counties

County	Number of Properties ³	Buffer Size (miles)	1 BR Average		2 BR Average		3 BR Average	
			Market	Assisted	Market	Assisted	Market	Assisted
Collier	3 market, 7 assisted	10	\$525	\$473	\$624	\$588	\$586	\$743
Gadsden	1 market, 9 assisted	10	\$302	\$526	\$369	\$590	\$406	\$682
Highlands	8 market, 11 assisted	10	\$464	\$506	\$633	\$510	\$531	\$535
Lee	42 market, 3 assisted	5	\$549	\$592	\$628	\$570	\$948	\$796
Manatee	26 market, 12 assisted	5	\$792	\$630	\$930	\$719	\$1,044	\$833
Palm Beach*	20 market, 1 assisted	7	\$1,252	\$800	\$1,640	\$944	\$2,004	\$1,093
Polk	12 market, 2 assisted	5	\$589	\$614	\$720	\$642	\$848	\$744

Notes: Palm Beach County area includes 1 market-rate property in Broward County because it falls within the 7-mile buffer around the property with a waiver request.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; phone/Internet research.

In Collier County, interviewees also noted clusters of private-market, substandard mobile homes that are available to both singles and families. Landlords can rent to several families or singles at once so that housing is less expensive for individual tenants but brings in a high total rent; for example, a mobile home might house six tenants each paying \$200 per month. The interviewees noted that tenants may choose these units over subsidized units because the workers lack documentation and generally find the subsidized housing application process more intrusive.

³ For market-rate properties, the number of properties reflects the number of developments for which we were able to obtain rent data via the Internet or a phone request. This may not reflect all multifamily developments in the buffer area. The number of assisted properties reflects the number of developments with “family” target population in the Assisted Housing Inventory for which rent data were available. Assisted properties that serve only elderly or special needs populations were not included in order to provide a sample that would be comparable to the family units contained in the farmworker properties.

Migrant Camps

Migrant labor camps provide temporary housing for farmworkers. The camps may consist of dormitories, single family homes, mobile homes, motels, or multifamily units. Most serve single, unaccompanied farmworkers, but some serve families. They are licensed by county departments of health and are tracked statewide by the Florida Department of Health. In some of the camps, the farm employer pays for the housing. In others, workers pay by the day, week or month.

The camps provide thousands of beds for migrant workers in the southern counties where there have been waiver requests. Table 8 describes the migrant camp inventory for the entire counties, while Maps 2 through 8 (Appendix 1) show the camps that are closest to the properties with waiver requests. The maps show that waiver properties in Collier, Highlands and Manatee Counties are surrounded by concentrations of migrant camps.

However, interviewees noted that migrant camps do not compete directly with the Florida Housing and RD farmworker developments because they serve different niches.⁴ While some of the migrant camps have units for families, most house single, male workers. In contrast, the Florida Housing and RD developments are mostly designed for families with children staying in place year-round. Moreover, many of the labor camp units in citrus growing regions are now being used by growers to house workers with H-2A visas (see discussion below).

⁴ Note, however, that a small number of licensed camps are also subsidized by Florida Housing or other public agencies. For example, Casa Cesar Chavez in Miami-Dade County is a Florida Housing Demonstration project that provides 144 beds for unaccompanied farmworkers in 28 two- and four-bedroom units. It is part of the larger Everglades Farmworker Village development. Another development, Horizon Village in Immokalee, is owned by the Collier County Housing Authority. It provides 192 beds in dormitory-style rooms with common kitchens and baths. Esmeralda Serrata from the Housing Authority noted that most of the units are now occupied by workers with H-2A visas.

Table 8. Migrant Labor Camps, Waiver Request Counties

County	Camps	Occupancy	Comments from County Staff
Collier	147	7,300	Most labor camps are off-farm mobile homes, apartment complexes and duplexes. These include some families. Three commercial farms provide approximately 1,000 beds in mobile homes, primarily for single men. For grower-owned camps, housing may be free or deducted from paycheck. County staff estimate average rent for off-site beds at \$45/week.
Gadsden	0	0	The county has seen a dramatic reduction in commercial tomato farming, and staff are not aware of any camps currently operating. Most farmworkers are able to live in their own homes due to rising wages.
Highlands	173	2,250	Additional information not available.
Lee	2	544	The county has two camps. One is made up of duplexes that house 350 workers, including families. The other is made up of dormitory style housing for approximately 200 single male workers. The housing is owned and provided by the growers and is built into the workers' weekly paycheck.
Manatee	29	2,545	Several growers operate migrant camps. Most grower-owned housing is mobile homes, with one dormitory-style development. Other migrant camps are made up of duplexes, triplexes and apartments, including some units for families. Rents run \$20-50 per week and are often deducted from workers' paychecks.
Palm Beach	42	6,767	Camps are owned by growers and contracted harvesters. They include military-style barracks and a mobile home park. There are also some larger housing units, some of which house families.
Polk	68	1,719	Additional information not available.

Note: Occupancy numbers represent single point in time as of April 2013. Camps may house more or fewer workers at other times of the year.

Source: Florida Department of Health; conversations with county public health staff.

Reasons for Decline in Farmworker Housing Demand

Our research showed two key reasons for declines in demand for multifamily farmworker units: 1) a decline in farm employment in Florida and 2) workers' undocumented status and the corresponding increase in the use of workers with H-2A visas. We also examined a third factor, program design for Florida Housing's farmworker funding, but found it to be less central to the upswing in waiver requests.

Key Factor #1: Decline in Farm Labor

A review of data and literature supports waiver applicants' contention that farm production and employment has declined in Florida in recent years, particularly in the citrus industry.

We used the method from the Center's triennial statewide Rental Market Study to estimate the number of farmworkers statewide. The estimate is based on the amount employers spend on farm wages each year and the number of weeks worked in a year per farmworker. Using this method, we estimated the number of farmworkers in Florida each year from 2004 to 2012. As Table 9 shows, this number declined each year.

Table 9. Estimated Farmworkers in Crop Production and Support Activities, 2004-2012, Florida⁵

2004	2005	2006	2007	2008	2009	2010	2011	2012
121,673	106,985	106,534	105,279	104,142	96,726	89,173	89,794	89,798

Source: U.S. Bureau of Labor Statistics, Quarterly Census of Employment and Wages; U.S. Department of Labor, National Agricultural Workers Survey.

Note that these figures do not include workers with H-2A visas. H-2A workers are not covered by unemployment insurance, so their wages are not reported to the Bureau of Labor Statistics.

The underlying data show some decline in the total amount of farm work performed (measured in weeks of work per year). More significantly, however, it shows an increase in the average number of weeks worked annually per farmworker, from 36 weeks per year in 2004 to 40 weeks per year in 2005-2008 and 42 weeks per year in 2009-2012. That is, a smaller number of workers, working more weeks per year, were responsible for a stable or slightly declining level of farm labor.

One potential explanation for the increase in weeks worked per farmworker is a shift toward crops that provide year-round work and away from more seasonal crops. Florida's leading crops by cash receipts are greenhouse and nursery products, oranges, vegetables (especially tomatoes), and sugar cane. (Florida Department of Agriculture 2013). U.S. Census of Agriculture statistics on land used for farming

⁵ The estimates of farmworkers are derived using the same method as in the statewide Rental Market Study: 1) Use wage data from the QCEW to calculate the total number of weeks worked in crop production per year; 2) Divide total number of weeks worked per year by the average annual weeks per worker from the NAWS to estimate the number of workers. For a full description of the method, see pages 2-3 of *2013 Rental Market Study: The Need for Farmworker Housing* at http://www.shimberg.ufl.edu/publications/RMS_farmworker.pdf. Farmworker estimates from past Rental Market Study reports differ from those reported here because figures for average weeks worked are derived from different years of NAWS data. Note that the NAWS is based on a small sample of workers, and that even modest changes in the average number of weeks per worker reported in the NAWS have a large effect on total number of farmworkers estimated.

show that the nursery sector and vegetable farming overall have grown in the last decade, but that sugar, tomato and, in particular, citrus crops have declined. Table 10 shows the change from 2002 to 2012 in acreage by type of crop for the state.

Table 10. Harvest/Production Acreage by Major Crop Type, 2002-2012, Florida

Crop Type	Measurement	2002	2007	2012	2002-2007 Change	2007-2012 Change	2002-2012 Change	Decline/Growth, 2002-12
Crops - All	Acres Harvested	2,313,537	2,112,129	2,184,485	-9%	3%	-6%	Decline
Vegetables - All	Acres Harvested	219,412	265,835	251,011	21%	-6%	14%	Growth
Tomatoes	Acres Harvested	45,648	40,437	39,807	-11%	-2%	-13%	Decline
Citrus - All	Acres Bearing & Non-Bearing	871,733	654,747	539,181	-25%	-18%	-38%	Decline
Oranges	Acres Bearing & Non-Bearing	719,674	561,324	465,001	-22%	-17%	-35%	Decline
Sugar	Acres Harvested	440,768	378,587	401,491	-14%	6%	-9%	Decline
Nurseries	Open Acres in Production	36,936	45,134	51,657	22%	14%	40%	Growth

Note: Acreage counts are not directly comparable across crop categories but are given to show change over time. "Non-bearing" citrus acreage refers to areas planted with young trees that have not yet borne fruit.

Source: U.S. Census of Agriculture

Table A1 in Appendix 1 shows changes in crop acreage by county. It shows that total cropland harvested dropped between 2002 and 2012 for all of the counties with waiver requests except Gadsden (Collier County statistics were unavailable for 2002, but acreage dropped between 2007 and 2012). Acreage also declined slightly in Hendry County, which is adjacent to farmworker developments in Immokalee.

Researchers point to a number of reasons for declines in production and the labor force in the fruit and vegetable sectors. Production of citrus and tomatoes has been in decline since the 1990s (Roka 2009). One cause is global competition. According to the USDA, fruit, vegetable, and nut imports to the U.S. have increased an average of 8 percent per year over the past decade (Johnson 2013). Citrus production has also been severely affected by natural disasters and disease. In 1998, citrus canker was introduced in Florida, causing a temporary dip in production. Next, in 2004-2005, hurricanes throughout the state damaged citrus groves and facilitated the spread of citrus greening, an even more serious and debilitating disease than citrus canker. As of 2011, citrus greening had resulted in an estimated 1.6 billion dollars in lost revenues (Roka, 2009; Hodges & Spreen, 2012), and is one probable cause for the record low orange production projections for the most recent 2013-2014 season (USDA, 2014).

Since most farmworkers in Florida are immigrants, a decline in immigration would also reduce the pool of available workers. Researchers note that immigration from Mexico to the United States has been leveling off since 2000 due to stricter immigration policies and enforcement, the U.S. recession, and more competitive job growth and wages available in Mexico (Passel et al 2012; Calvin & Martin 2010; Iwai et. al. 2012; Taylor & Yunez-Naude 2012). However, immigration from Guatemala and Honduras

may be compensating somewhat for the drop in immigration from Mexico (Brick et. al. 2012), a view shared by interviewees in Immokalee.

Mechanization does not appear to have played a significant role in the reduction of the workforce in citrus and vegetable harvesting. Mechanical harvesting of process (juice) citrus in Florida peaked at only 5.8 percent of the crop in the 2007-2008 season, and fresh tomatoes continue to be harvested by hand. While the process orange harvest may become more mechanized in the future, it will require technological fixes for two problems: 1) preventing damage to trees from mechanical harvesting, a particular concern for growers given the trees' weakened state from disease; and 2) difficulties in harvesting Valencia oranges mechanically, which make up 25-30 percent of state's total orange harvest (Calvin and Martin 2010).

Researchers have found that the recent recession did not affect agriculture as much as other industries, particularly for fruit and vegetable farming (Schnepf 2012, Sundell and Shane 2012). However, a number of interviewees noted that workers tend to leave farm work when the economy *improves*, because jobs in other industries such as construction, landscaping, tourism and retail become available. In particular, they expect farmworkers living near coastal areas to be attracted to home construction jobs as Florida's housing sector recovers from the recession.

Key Factor #2: Immigration Status: Undocumented Workers and H-2A Visas

A second key factor in the decline in demand for farmworker housing is workers' documentation status. Undocumented workers are ineligible for rental assistance and are more likely to seek out informal housing arrangements.

As the most recent NAWS data (2009-2012) show, a majority of workers report their immigration status as "unauthorized." Legal status through citizenship or permanent residency is somewhat more common among non-migrant workers, but still a minority.

Table 11. Farmworkers by Legal Status, 2009-2012

	Citizen	Legal Permanent Resident	Other Work Authorization	Unauthorized
All farmworkers	10%	19%	2% ^a	69%
Migrant	^b	15%	^b	83%
Non-migrant	14%	20%	2% ^a	64%

Notes: The NAWS is a survey of a sample of workers, so all estimates are subject to error. Values marked with an "a" have relative standard errors between 31 and 50 percent of the value, and should be interpreted with caution. A "b" denotes an estimate that has been suppressed because there were fewer than four responses or the relative standard error is greater than 50 percent of the value found. Percentages may not total 100 percent due to suppressed values.

Source: U.S. Department of Labor, National Agricultural Workers Survey

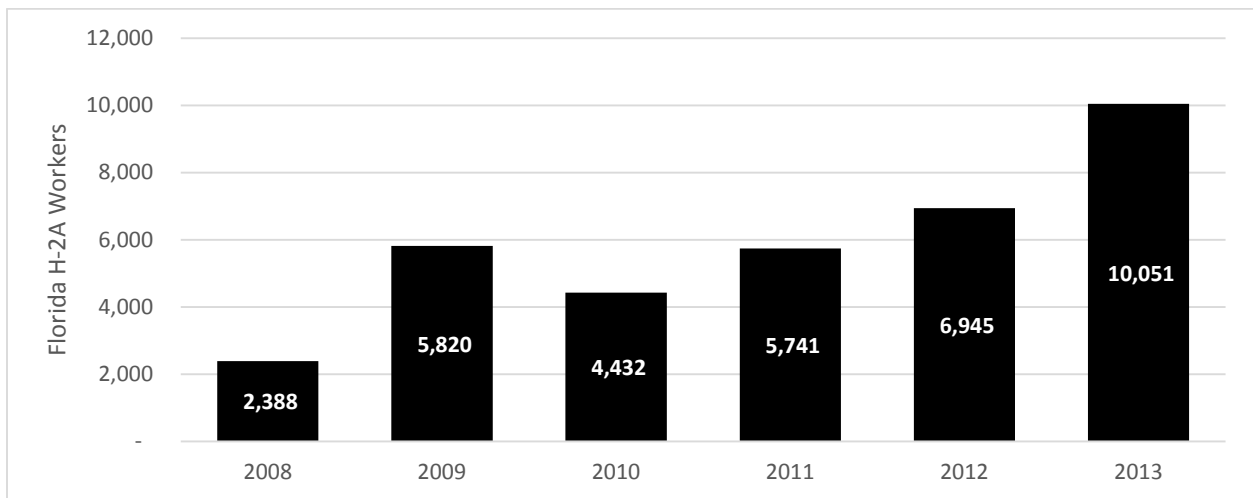
This does not represent a recent change. Since 2000, in the National Agricultural Workers Survey (NAWS), approximately 70 percent of Florida workers have consistently reported undocumented status. However, several interviewees and secondary sources noted increased enforcement of immigration violations. For example, an interviewee cited a July 2014 raid at a Naples packinghouse where over 100 workers were arrested following an investigation of workers' compensation documentation.

The immigration-related factor that has changed in the past several years is a sharp increase in the use of workers with temporary H-2A visas. The H-2A program allows U.S. growers or contractors to bring foreign workers to the U.S. to fill temporary or seasonal agriculture jobs if they can “demonstrate that there are not sufficient U.S. workers who are able, willing, qualified, and available to do the temporary work.”⁶ The increase in H-2A workers reduces the demand for multifamily farmworker housing because most H-2A workers are single adults, and because the program requires the employer to provide housing for them.

The number of H-2A workers in Florida more than quadrupled from 2,388 in 2008 to 10,051 in 2013, accounting for more than a third of the total increase in H-2A visas nationwide. Because much of the increase occurred from 2012 to 2013, this increase in legally authorized workers would not be fully reflected in the NAWS data presented in Table 11.

As Map 9 (Appendix 1) shows, citrus and vegetable growing regions in south central and southwest Florida accounted for three-quarters of the state’s H-2A workers in 2013, with particularly large concentrations at work sites in Arcadia in DeSoto County and LaBelle in Hendry County. These are the same regions where most of the properties with waiver requests are located.⁷ A number of H-2A workers also work in the Tampa Bay area. In contrast, few H-2A workers work in Miami-Dade County, where nurseries and greenhouses provide more stable year-round employment.

Figure 3. H-2A Workers Certified in Florida, 2008-2013



Source: U.S. Department of Labor, Employment and Training Administration

⁶ U.S. Citizenship and Immigration Services, *H-2A Temporary Agricultural Workers*, <http://www.uscis.gov/working-united-states/temporary-workers/h-2a-agricultural-workers/h-2a-temporary-agricultural-workers>.

⁷ Three of the waiver request properties are located in Collier County. While Collier County has few H-2A workers of its own, the properties are located close to the borders with Hendry and Lee County, which each have large concentrations of H-2A work sites.

Table 12. H-2A Workers Certified by City and County of Work Site, 2013

County	City	H-2A Workers
Bradford	Starke	10
Brevard	Mims	4
Charlotte	Punta Gorda	114
Collier	Immokalee	49
Desoto	Arcadia	2,563
Hardee	Wauchula	382
	Zolfo Springs	335
Hendry	Clewiston	475
	Felda	169
	Labelle	1,041
Hernando	Brooksville	300
Highlands	Avon Park	692
	Lake Placid	450
	Lorida	73
	Sebring	119
	Venus	40
Hillsborough	Dover	344
	Plant City	100
	Wimauma	8
Indian River	Fellsmere	174
	Vero Beach	23
Lake	Mt. Dora	24
Lee	Alva	325
	Fort Myers	276
Manatee	Myakka City	5
Miami-Dade	Florida City	40
Okeechobee	Okeechobee	59
Orange	Orlando	18
	Winter Garden	30
Osceola	St. Cloud	5
Palm Beach	Belle Glade	97
	Loxahatchee	175
Polk	Auburndale	61
	Bartow	70
	Dundee	470
	Haines City	20
	Polk City	133
	Winter Haven	725
St. Lucie	Fort Pierce	53
Total		10,051

Source: U.S. Department of Labor, Employment and Training Administration

Many interviewees noted that if immigration laws were overhauled to provide legal status for undocumented immigrants, demand for multifamily farmworker housing would increase dramatically, both because more workers would be eligible and willing to apply for subsidized housing and because use of temporary H-2A workers would decrease. More modest policy changes tightening the use of H-2A

workers could shift more farm work back to long-term residents, also increasing demand for the multifamily developments.

Effects of Housing Program Design on Demand

With a few exceptions, Florida Housing's farmworker programs are designed to produce units for family households who commit to year-round leases. These units are not designed to serve single workers and migrant workers needing short-term units.

Carving out this niche reduces the pool of farmworkers who can realistically qualify for Florida Housing's units. Note, however, that Florida's workforce is moving toward more family and non-migrant households, consistent with the existing multifamily housing product. As described above, the NAWS shows a steady decline in migration and an increase in the percentage of farmworkers who are living with family members over the last decade. Moreover, of the workers who are single migrants, more are H-2A visa recipients who are provided housing by their employers. Therefore, while the targeting of multifamily developments to families and long-term residents may reduce demand for units over the long term, it is not responsible for any *recent* downswing in farmworker housing demand.

Interviewees generally did not support modifying the rules for existing properties to provide short-term housing or serve more single workers. Since many workers are staying in place for longer periods of the year, 12-month leases pose less of a problem. Migrant households can maintain their leases outside of the local growing season by having part of the family stay behind in the unit or by paying rent even for months when the unit is vacant. One interviewee also noted that 12-month leases protect tenants from eviction, as in any other multifamily development, and that a steady year-round rent stream is necessary to ensure properties can meet their debt service obligations.

Another aspect of program design is the requirement that farmworker tenants receive at least half of their income from agricultural work. While some interviewees flagged this as problematic, others felt that it was not a difficult standard to meet. The latter view is strongly supported by the NAWS data, which show that nearly all farmworkers report deriving more than half of their income from farm employment. One advocate noted that this standard protects against filling farmworker set-aside units with tenants who have performed only a nominal amount of farm work.

Conclusion

Florida Housing's farmworker developments fill a niche in the assisted housing supply, providing affordable family apartments for farmworkers whose household and work arrangements allow them to commit to a year-round lease. Two countervailing demographic trends within the farm labor workforce affect demand for this product. On the one hand, in the state as a whole, fewer workers are migrating, workers are spending more weeks on average per year in farm labor, and more are parents with children than in the past. On the other hand, in the south central region in particular, growth in the H-2A workforce introduces new competitors for farm jobs who are not potential customers of Florida Housing's farmworker developments. The high proportion of undocumented workers in the farm labor force also presents an ongoing barrier to filling farmworker units, particular when stronger enforcement efforts are in place. These trends take place beside a recent reduction in farm labor activity in the state, especially in citrus and vegetable growing regions.

The factors behind farm labor trends range from short to long-term, but none are irreversible. They include episodic economic patterns (bad winters, alternative employment due to strengthening of construction and tourism industries); longer term reduction in crop production from global competition and disease; and the difficult problem of reforming immigration law. If citrus greening disease and immigration barriers are addressed, there will be a strong increase in demand for multifamily farmworker housing. Any changes to waiver and set-aside policies should acknowledge the short- and mid-term reduction in demand but leave the door open to addressing this upswing in the long term.

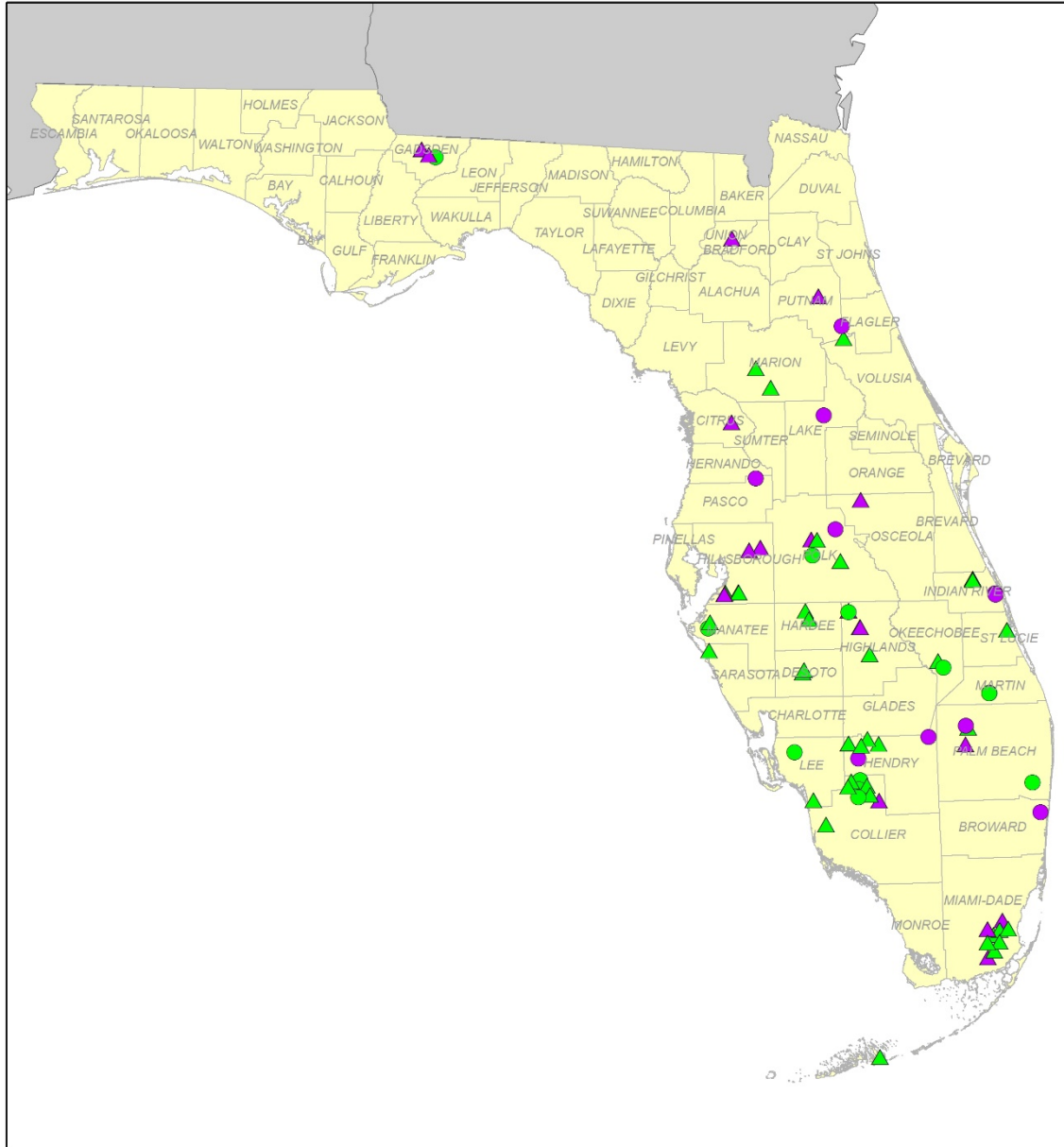
References

- Brick, K., Challinor, A. E., & Rosenblum, M. R. (2011). *Mexican and Central American immigrants in the United States*. Retrieved from <http://www.migrationpolicy.org/pubs/MexCentAmimmigrants.pdf>.
- Calvin, L., & Martin, P. L. (2010). *The US produce industry and labor: Facing the future in a global economy*. US Department of Agriculture, Economic Research Service.
- Florida Department of Agriculture. (2013). *Florida Agriculture by the Numbers*. Retrieved from [http://www.nass.usda.gov/Statistics_by_State/Florida/Publications/Agriculture_Statistical_Directory/2013/2013%20FL%20Ag%20by%20the%20Numbers\(FASD\).pdf](http://www.nass.usda.gov/Statistics_by_State/Florida/Publications/Agriculture_Statistical_Directory/2013/2013%20FL%20Ag%20by%20the%20Numbers(FASD).pdf).
- Hodges, A. and Spreen, T. (2012) Economic Impacts of Citrus Greening (HLB) in Florida, 2006/07 – 2010/11. *EDIS Document, Food and Resource Department, Florida Cooperative Extension Service, University of Florida*. Retrieved from <http://edis.ifas.ufl.edu/pdffiles/FE/FE90300.pdf>
- Iwai, N., Emerson, R. D., & Roka, F. M. (2012). Immigration reform and citrus harvest mechanization in a world of uncertainty. *International Symposium on Mechanical Harvesting and Handling Systems of Fruits and Nuts 965*. Retrieved from http://www.actahort.org/members/showpdf?booknrarnr=965_31.
- Johnson, R. (2013). *US Trade Situation for Fruit and Vegetable Products*. BiblioGov.
- Passel, J. S., D'Veira Cohn, G. B. A., & Gonzalez-Barrera, A. (2012). *Net Migration from Mexico Falls to Zero--and Perhaps Less*. Retrieved from <http://www.pewhispanic.org/2012/04/23/net-migration-from-mexico-falls-to-zero-and-perhaps-less>.
- Roka, Fritz. (2009). *Farm Labor Issues Facing Florida Tomato and Orange Producers*. [PowerPoint slides]. Retrieved from <https://migrationfiles.ucdavis.edu/uploads/cf/files/2009-may/roka.pdf>.
- Schnepf, Randy. (2012). *U.S. Farm Income*. Cornell University ILR School Digital Commons. Retrieved from http://digitalcommons.ilr.cornell.edu/cgi/viewcontent.cgi?article=1898&context=key_workplace.
- Sundell, Paul and Mathew Shane. (2012) *The 2008-2009 Recession and Recovery: Implications for the Growth and Financial Health of U.S. Agriculture*. US Department of Agriculture, Economic Research Service. Retrieved from http://www.ers.usda.gov/media/619162/wrs1201_1_1_.pdf.
- Taylor, J. E., Charlton, D., & Yúnez-Naude, A. (2012). The end of farm labor abundance. *Applied Economic Perspectives and Policy*, 34(4), 587-598.

United States Department of Agriculture. (2014) *Citrus June Forecast*. Retrieved from http://www.nass.usda.gov/Statistics_by_State/Florida/Publications/Citrus/fcs/2012-13/fcs1213.pdf

Appendix 1. Maps and Tables

Map 1. Farmworker Developments, Florida Housing Finance Corporation and USDA Rural Development

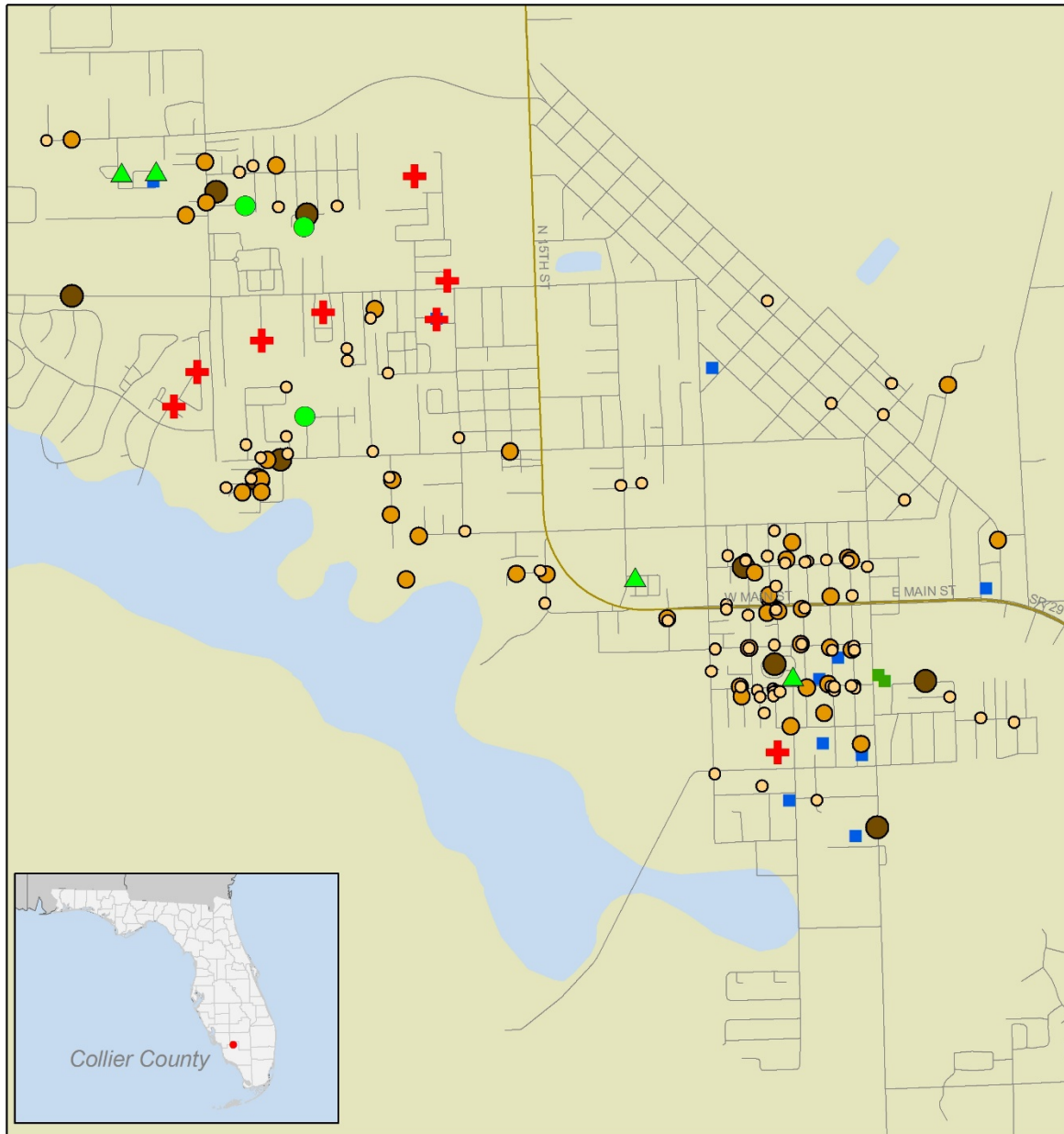


- FHFC Farmworker Properties: Waiver Requested or Received
- ▲ Other FHFC Farmworker Properties
- RD Properties: Waiver Received
- ▲ Other RD Farmworker Properties

N
0 40
Miles

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Housing Finance Corporation

Map 2. Multifamily Housing and Migrant Labor Camps, Collier County (Partial; Immokalee Area)

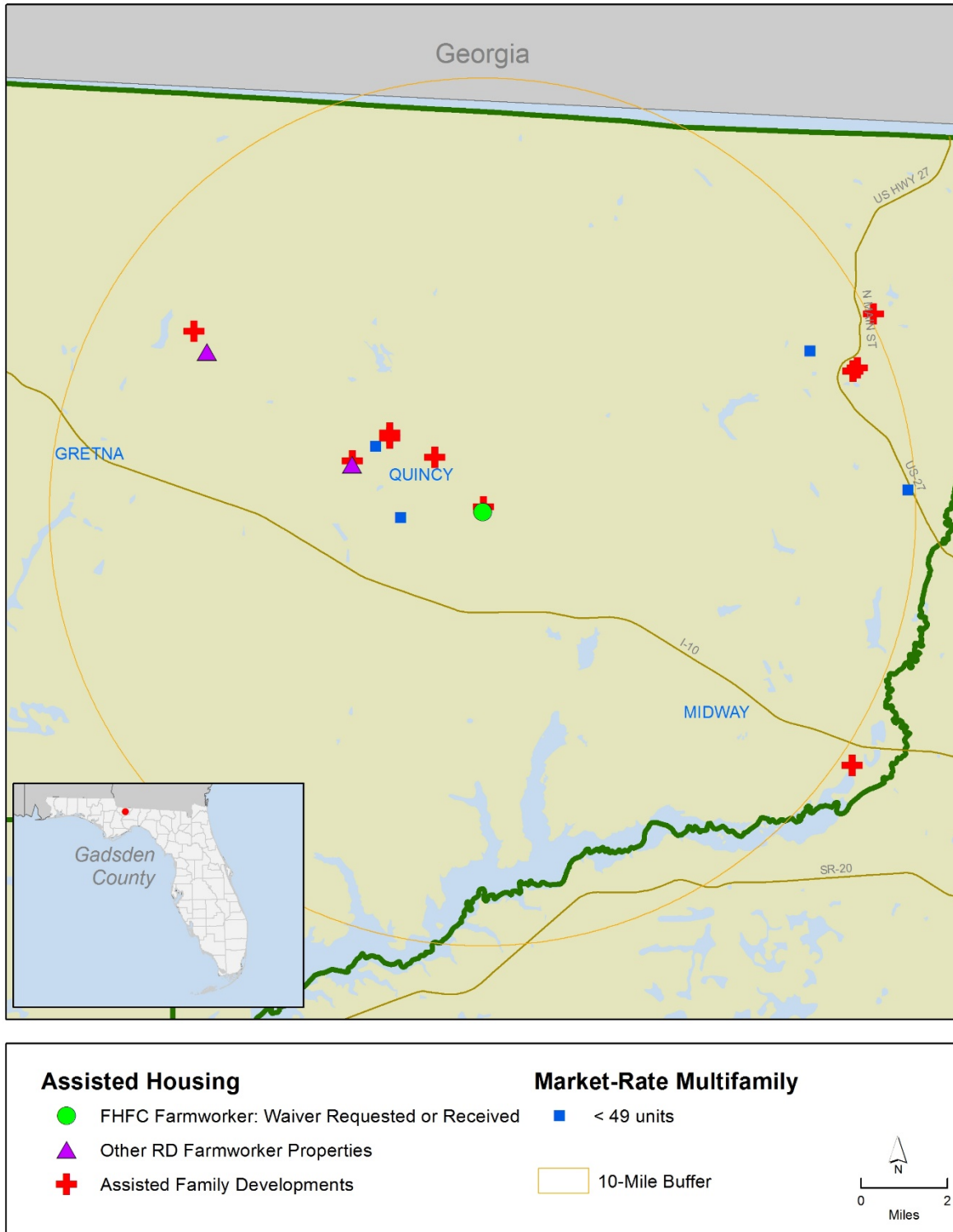


Assisted Housing		Migrant Camps	Market-Rate Multifamily
●	FHFC Farmworker: Waiver Requested or Received	○	■ < 49 units
▲	Other FHFC Farmworker Properties	●	■ > 50 units
+	Assisted Family Developments	●	
		○	
		●	
		●	

0 0.25
 Miles

Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.
 Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

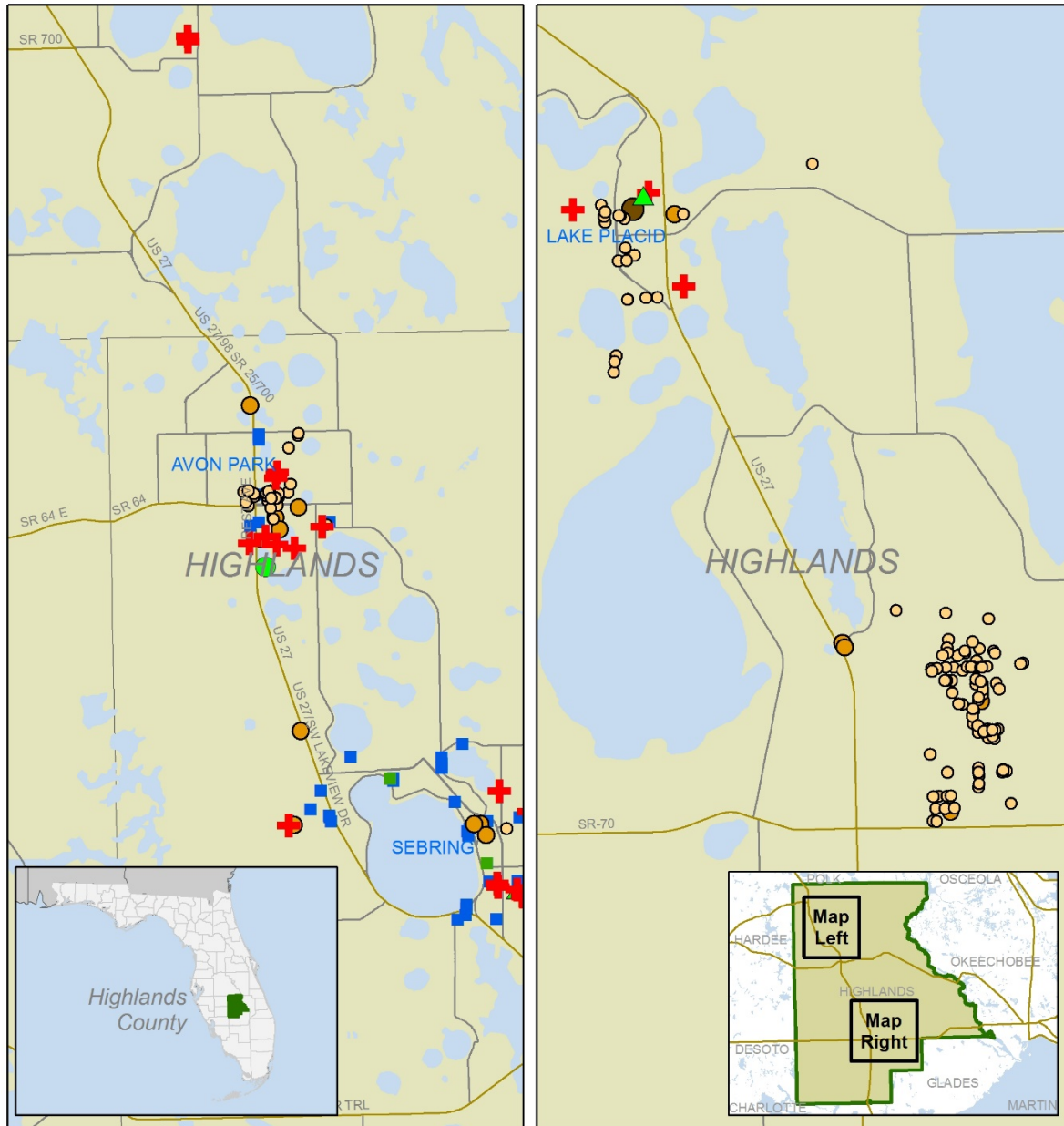
Map 3. Multifamily Housing and Migrant Labor Camps, Gadsden County (Partial)



Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

Map 4. Multifamily Housing and Migrant Labor Camps, Highlands County (Partial)

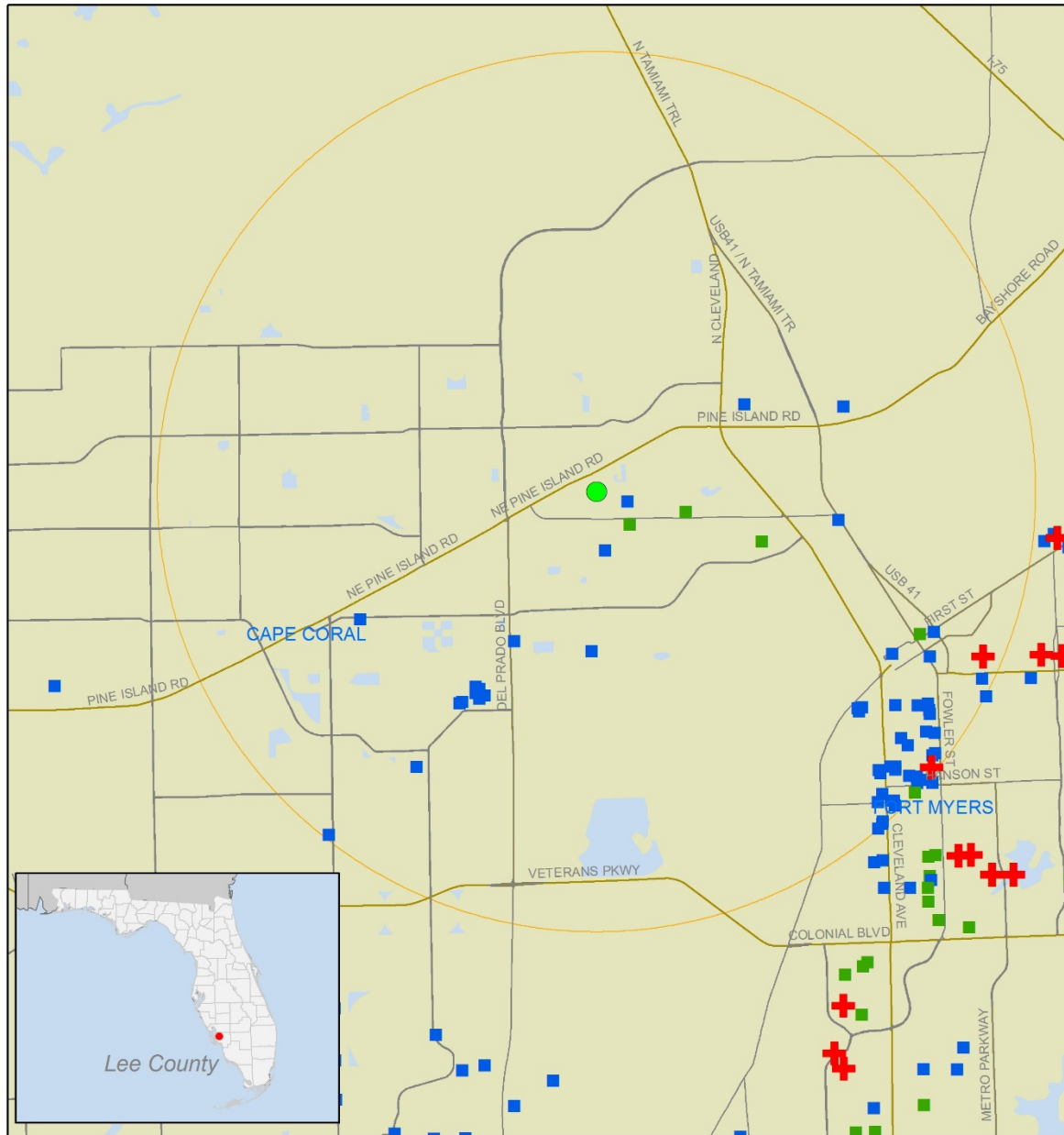


Assisted Housing		Migrant Camps		Market-Rate Multifamily	
●	FHFC Farmworker: Waiver Requested or Received	○	2 - 20	■	< 49 units
▲	Other FHFC Farmworker Properties	●	21 - 100	■	> 50 units
+	Assisted Family Developments	●	101 - 1822		

Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

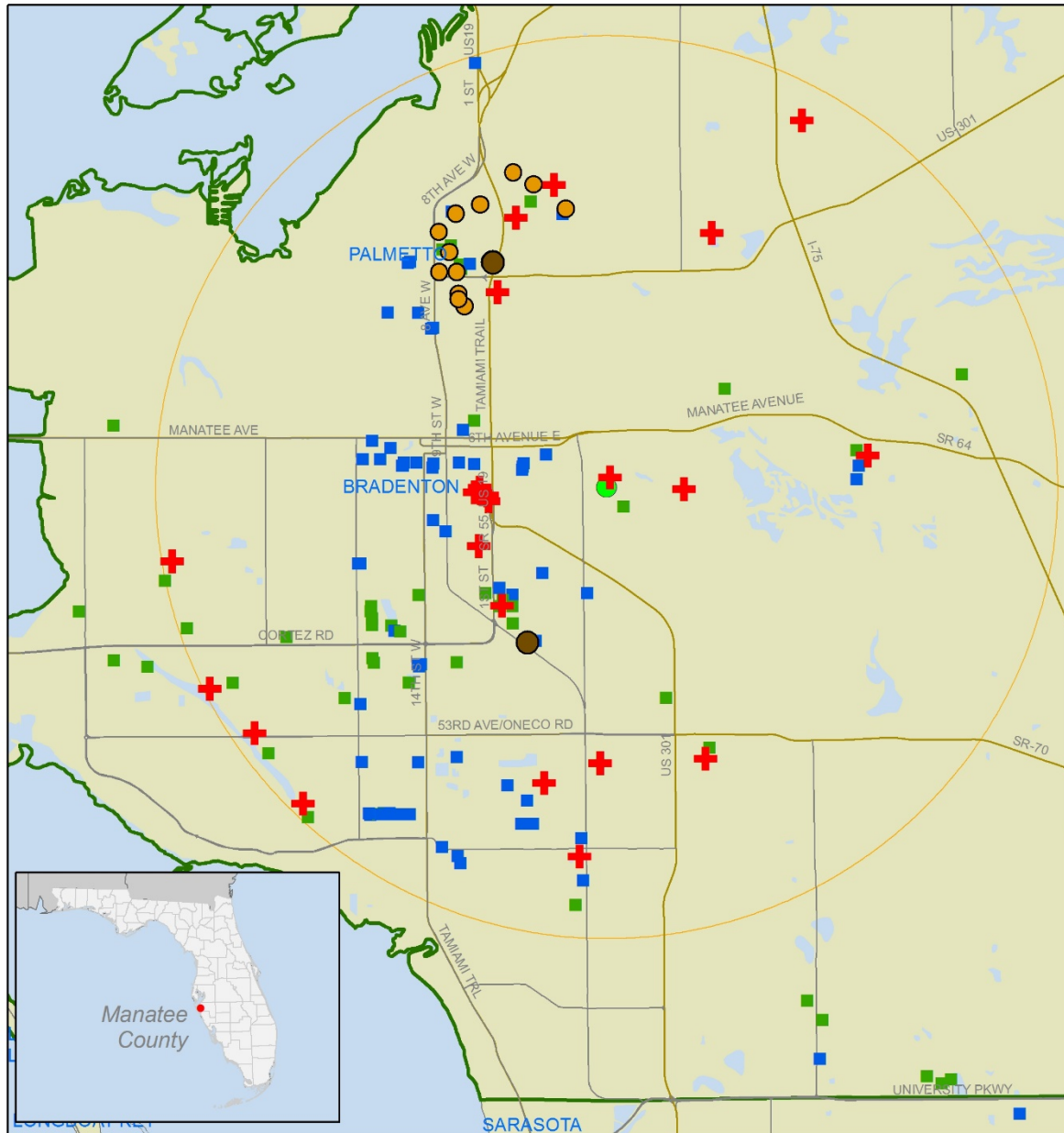
Map 5. Multifamily Housing and Migrant Labor Camps, Lee County (Partial)



Assisted Housing		Market-Rate Multifamily	
●	FHFC Farmworker: Waiver Requested or Received	■	< 49 units
+	Assisted Family Developments	■	> 50 units
	5-Mile Buffer		

Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.
 Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

Map 6. Multifamily Housing and Migrant Labor Camps, Manatee County (Partial)

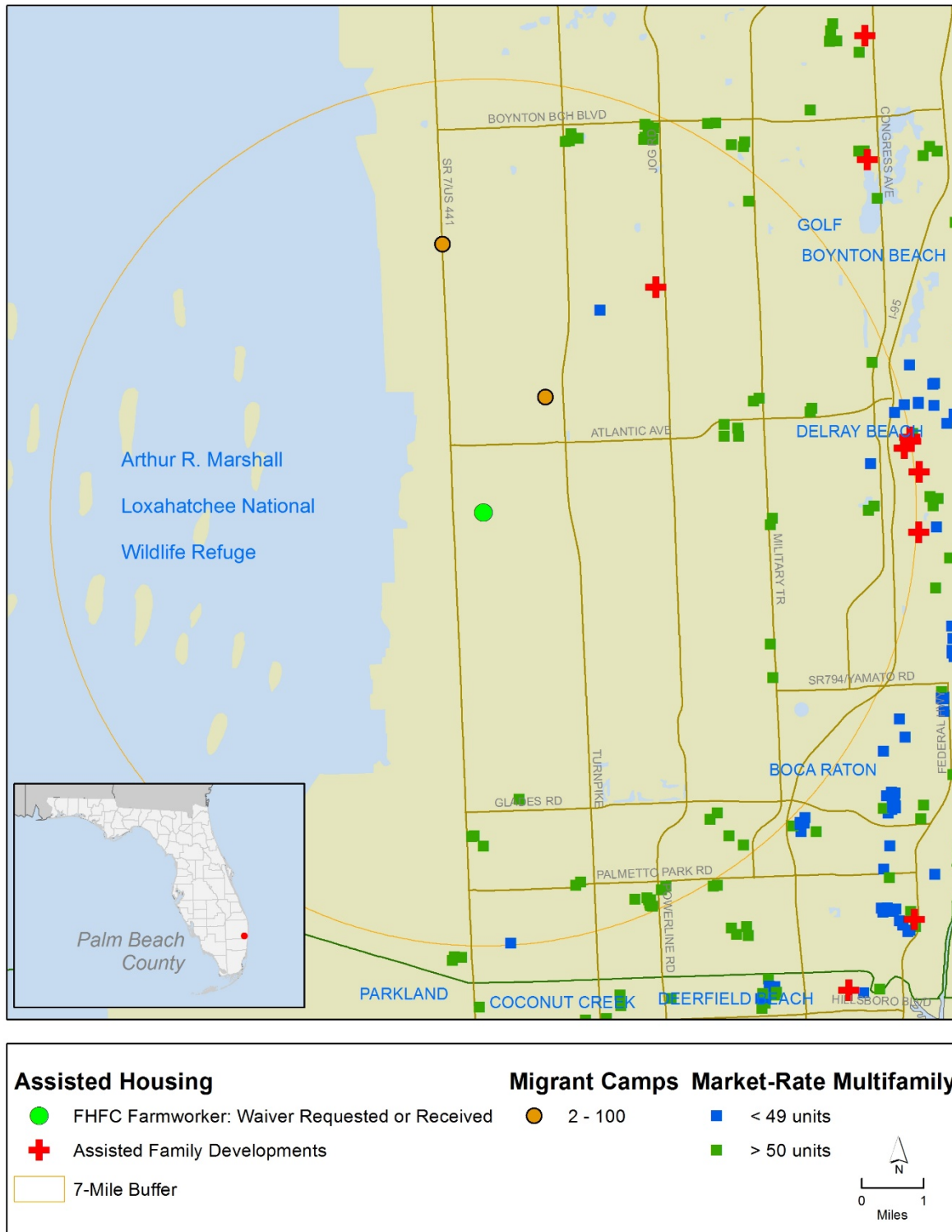


Assisted Housing		Migrant Camps	Market-Rate Multifamily
●	FHFC Farmworker: Waiver Requested or Received	●	■
+	Assisted Family Developments	●	■
	5-Mile Buffer	21 - 100	< 49 units
		101 - 1822	> 50 units

Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

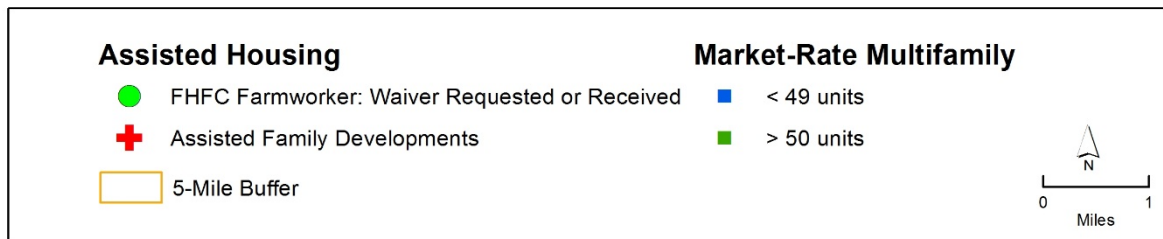
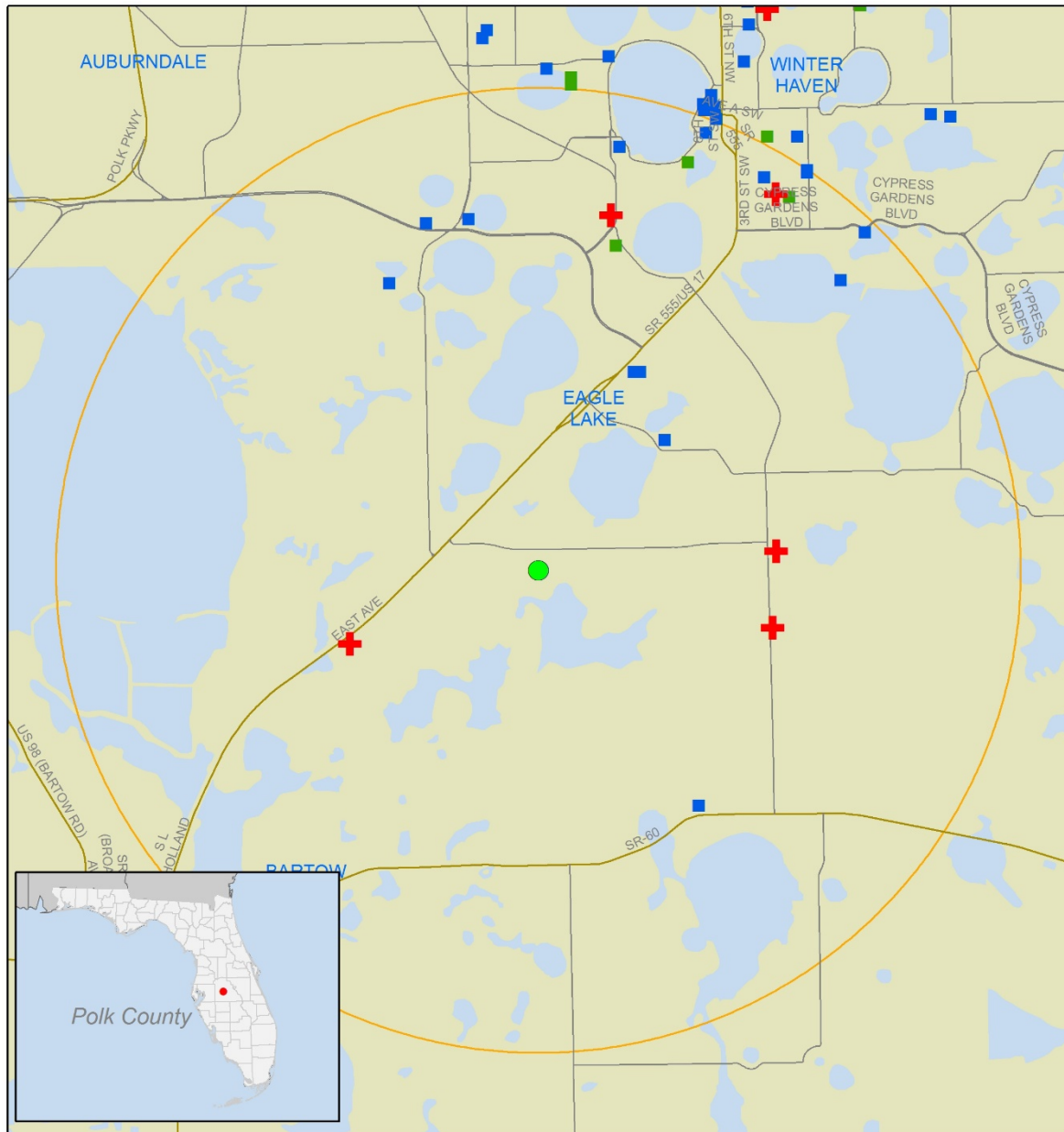
Map 7. Multifamily Housing and Migrant Labor Camps, Palm Beach County (Partial)



Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

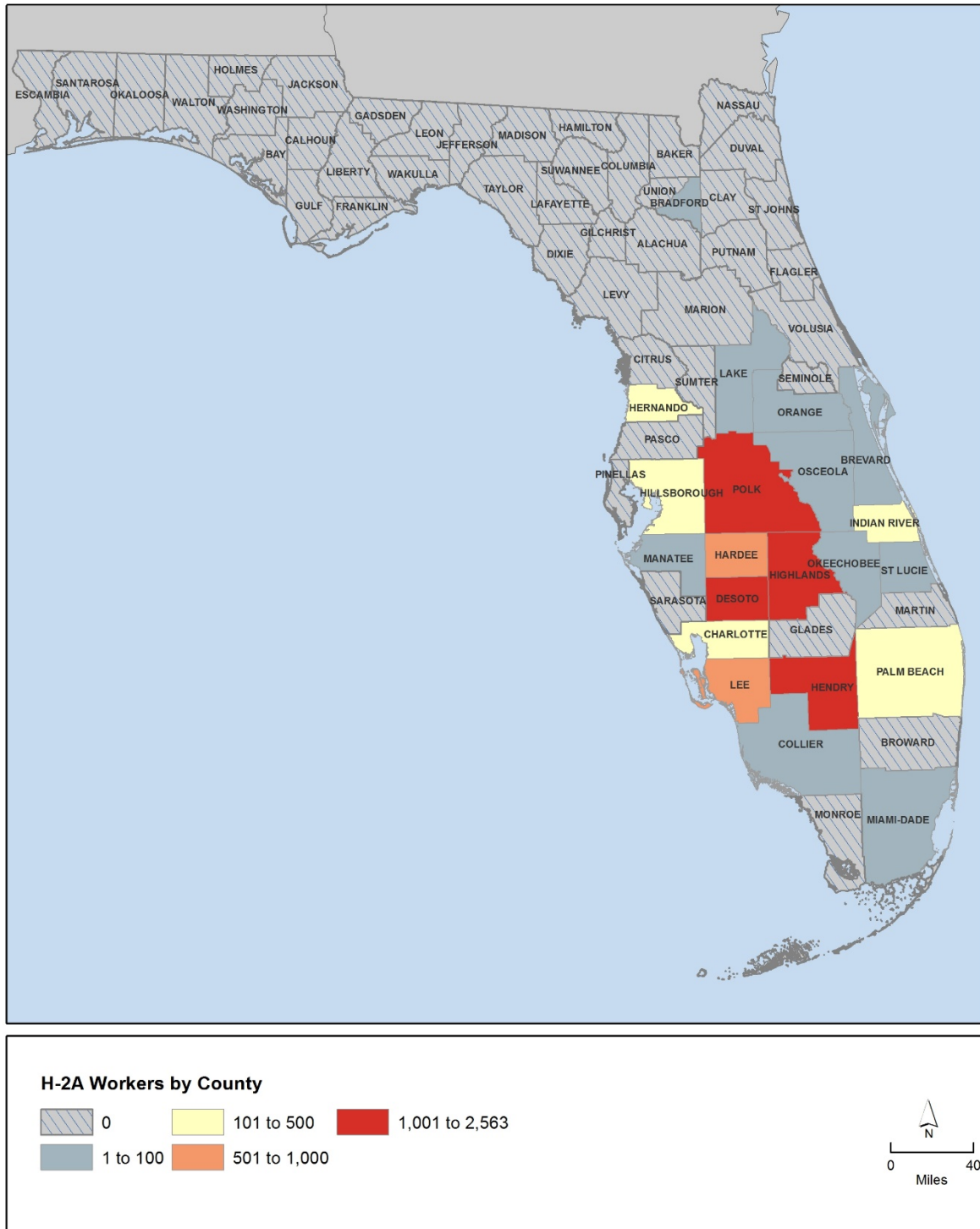
Map 8. Multifamily Housing and Migrant Labor Camps, Polk County (Partial)



Note: Migrant camp numbers refer to the count of beds occupied by workers in April 2013.

Source: Shimberg Center for Housing Studies, Assisted Housing Inventory; Florida Department of Business and Professional Regulation; Florida Department of Revenue; Florida Department of Health

Map 9. H-2A Workers Certified by County of Work Site, 2013



Note: County location refers to the location of the farm work site, not the worker's residence.

Source: U.S. Department of Labor, Employment and Training Administration

Table A1. Cropland Acreage by County, 2002-2012

County	2002	2007	2012	2002-2007 Change	2007-2012 Change	2002-2012 Change	Decline/ Growth 2002-12
Alachua	39,281	39,757	44,070	1%	11%	12%	Growth
Baker	1,844	2,629	2,704	43%	3%	47%	Growth
Bay	1,256	1,700	2,094	35%	23%	67%	Growth
Bradford	5,410	5,896	7,288	9%	24%	35%	Growth
Brevard	15,651	15,613	13,127	0%	-16%	-16%	Decline
Broward	4,385	2,577	3,085	-41%	20%	-30%	Decline
Calhoun	19,186	13,249	16,501	-31%	25%	-14%	Decline
Charlotte	(D)	21,663	15,117	N/A	-30%	N/A	N/A
Citrus	4,051	6,146	5,096	52%	-17%	26%	Growth
Clay	2,904	2,937	4,450	1%	52%	53%	Growth
Collier	(D)	35,288	30,096	N/A	-15%	N/A	N/A
Columbia	9,636	13,856	22,204	44%	60%	130%	Growth
Desoto	87,005	63,585	55,880	-27%	-12%	-36%	Decline
Dixie	2,874	4,246	9,249	48%	118%	222%	Growth
Duval	4,368	3,877	3,872	-11%	0%	-11%	Decline
Escambia	28,456	44,884	36,753	58%	-18%	29%	Growth
Flagler	5,292	8,095	4,445	53%	-45%	-16%	Decline
Franklin	(D)	(D)	658	N/A	N/A	N/A	N/A
Gadsden	7,616	9,229	9,156	21%	-1%	20%	Growth
Gilchrist	14,651	23,088	34,202	58%	48%	133%	Growth
Glades	52,786	40,448	51,343	-23%	27%	-3%	Decline
Gulf	114	719	286	531%	-60%	151%	Growth
Hamilton	8,465	11,650	24,514	38%	110%	190%	Growth
Hardee	70,728	53,378	46,460	-25%	-13%	-34%	Decline
Hendry	203,203	190,473	192,555	-6%	1%	-5%	Decline
Hernando	12,139	8,212	13,591	-32%	66%	12%	Growth
Highlands	99,362	83,516	69,917	-16%	-16%	-30%	Decline
Hillsborough	59,342	44,661	41,421	-25%	-7%	-30%	Decline
Holmes	17,694	18,804	25,243	6%	34%	43%	Growth
Indian River	65,311	54,953	47,103	-16%	-14%	-28%	Decline
Jackson	73,936	101,578	94,902	37%	-7%	28%	Growth
Jefferson	16,347	11,910	15,093	-27%	27%	-8%	Decline
Lafayette	7,044	11,726	18,139	66%	55%	158%	Growth
Lake	35,899	24,944	32,388	-31%	30%	-10%	Decline
Lee	25,762	18,308	20,038	-29%	9%	-22%	Decline
Leon	3,705	4,683	4,277	26%	-9%	15%	Growth
Levy	39,122	44,870	46,866	15%	4%	20%	Growth

County	2002	2007	2012	2002-2007 Change	2007-2012 Change	2002-2012 Change	Decline/ Growth 2002-12
Liberty	223	184	741	-17%	303%	232%	Growth
Madison	21,744	20,388	27,385	-6%	34%	26%	Growth
Manatee	60,900	58,920	59,209	-3%	0%	-3%	Decline
Marion	30,601	32,626	46,585	7%	43%	52%	Growth
Martin	55,470	44,442	31,112	-20%	-30%	-44%	Decline
Miami-Dade	55,142	49,065	61,567	-11%	25%	12%	Growth
Monroe	(D)	(D)	103	N/A	N/A	N/A	N/A
Nassau	2,699	2,416	2,985	-10%	24%	11%	Growth
Okaloosa	10,739	13,402	13,910	25%	4%	30%	Growth
Okeechobee	38,984	30,055	32,914	-23%	10%	-16%	Decline
Orange	16,904	15,097	11,926	-11%	-21%	-29%	Decline
Osceola	27,448	29,901	22,130	9%	-26%	-19%	Decline
Palm Beach	428,683	401,524	383,617	-6%	-4%	-11%	Decline
Pasco	21,332	20,673	19,893	-3%	-4%	-7%	Decline
Pinellas	319	(D)	499	N/A	N/A	56%	Growth
Polk	134,101	115,721	106,895	-14%	-8%	-20%	Decline
Putnam	9,177	7,996	9,577	-13%	20%	4%	Growth
Santa Rosa	45,057	28,229	66,254	-37%	135%	47%	Growth
Sarasota	6,418	5,969	3,513	-7%	-41%	-45%	Decline
Seminole	2,564	2,145	1,814	-16%	-15%	-29%	Decline
St. Johns	22,236	18,485	17,062	-17%	-8%	-23%	Decline
St. Lucie	97,929	56,479	56,553	-42%	0%	-42%	Decline
Sumter	18,131	16,222	13,105	-11%	-19%	-28%	Decline
Suwannee	40,012	48,981	68,696	22%	40%	72%	Growth
Taylor	870	1,025	1,786	18%	74%	105%	Growth
Union	6,395	5,518	6,778	-14%	23%	6%	Growth
Volusia	12,522	13,660	19,221	9%	41%	53%	Growth
Wakulla	1,018	557	1,217	-45%	118%	20%	Growth
Walton	12,570	19,648	17,691	56%	-10%	41%	Growth
Washington	8,512	9,406	15,564	11%	65%	83%	Growth

Note: Counties with at least one Florida Housing waiver request property are listed in **bold**. Values in cells with a (D) have been suppressed to protect confidential information.

Source: U.S. Census of Agriculture

Appendix 2. Meeting Attendees and Interviewees

Florida Housing Finance Corporation and Shimberg Center staff met with a group of stakeholders to discuss farmworker and housing trends on July 24, 2014 at Reserves at Eden Gardens in Immokalee. Starred names below denote meeting attendees. The Shimberg Center interviewed the other individuals on this list by phone following the meeting. Meeting attendees and phone interview participants are both referred to as “interviewees” in the main text.

Farm Labor Experts and Advocates

Daniel Carroll, U.S. Department of Labor

Moises Loza and Lance George, Housing Assistance Council

Barbara Mainster, Redlands Christian Migrant Association*

Lois Monroe, Farmworker Coordinating Committee of Palm Beach County

Fritz Roka, University of Florida Southwest Florida Research and Education Center*

Rob Williams, Florida Legal Services

Housing Providers and Agencies

Pamela Borton, Southwind Management Services*

Sr. Cathy Buster, Catholic Charities Housing, Diocese of Venice

Donna Carman, Indiantown Non-Profit Housing

Susan Golden, Immokalee Housing and Family Services*

Deborah Horst, USDA RD Southern Florida office

Steve Kirk, Rural Neighborhoods, Inc.

Carlos Lozano, Pueblo Bonito, Bradenton (on-site manager)

Frank Nappo, Immokalee Housing and Family Services*

Santos de la Rosa, Florida Non-Profit Housing, Inc.

Esmeralda Serrata , Collier County Housing Authority*

Valerie Vallee, Services Taylor Made*

Elizabeth Velasquez, Immokalee Housing and Family Services*

Growers and Farm Labor Contractors

Michael Bartos, Consolidated Citrus

Ron Hamel, Gulf Citrus Growers Association

Paul Meador, Everglades Harvesting and Hauling, Inc.