



RESEARCH & CONSULTING GROUP

mari@marigallagher.com www.marigallagher.com

© MG

FLORIDA COVID-19 EMPLOYMENT DISRUPTION & RESULTING MEAL DEFICIT ANALYSIS

A Granular Analysis Across the State

COUNTY MAP GUIDE

Commissioned By





PLEASE NOTE

- 1. MG created maps for every Florida county.
- 2. Each county has 10 maps in its individual folder, except Miami-Dade and Monroe, which have extra zoom-in maps to improve visibility. Viewers can also create custom zoom-in maps. This is described in note #9.
- 3. All county folders are listed in the master map folder in alphabetical order and the county folders are also numbered in that order. For example, Alachua is in folder "1 Alachua," Leon is in folder "36 Leon," and Washington is in folder "67 Washington."
- 4. All individual map file names begin with a number that corresponds to the listing in the next section (Map Listing & Description).

It is best to view maps on a desktop computer.

ಹಿಂದ

Increase the "percentage shown" number (usually located at the top of the PDF) to enlarge features.

- 5. All maps are at the block group level (except the SNAP-only map, which details location points on blocks and is represented by a dot, and the baseline map, which simply shows the features of the county absent of any overlaying data). What are block groups? Block groups consist of small clusters of individual blocks. Imagine dividing the state Florida into more than 11,400 small pieces and estimating highly reliable COVID-19 employment disruption and missing meals for each one. This is what this work accomplishes.
- 6. All maps are **HIGH RESOLUTION**.
- 7. All maps are **designed to be viewed on a computer** using a program that can read PDF files; they are not designed to be printed onto a standard page size or through a typical printer.
- 8. We suggest that the map file size not be reduced; that would compromise quality.
- 9. Because the maps are at a very high resolution, the viewer can increase the "percentage shown" number (usually located at the top of the PDF) to enlarge features. This enables to viewer to zoom in. The viewer can create a custom zoomin map by doing this and then taking a screen shot.
- 10. **VIEWING DIFFICULITIES**: Maps are large in file size, and each viewer's display quality depends on the PDF software used for viewing. Older PDF software might take longer to load. Should a page appear incomplete or show a line running through it, simply use your mouse to click on that page and it should reformat. Or exit out of the



map and re-open it again. Again, these maps are designed to be viewed on a computer. Viewing by phone or another small device will likely result in difficulties.

11. HOW TO CITE THIS WORK: All maps, as well as any related analysis, must be attributed to the author and sponsor in this way:

> Research by Mari Gallagher Research & Consulting Group, full release May 2020. Research sponsored by Feeding Florida.

- 12. Most maps are dated April 13th as that is when the mapping template was designed for the new maps related to employment disruption and an update of missing meals, but all maps were reviewed for release May 2020.
- 13. This body of work was sponsored by Feeding Florida, whose food bank network serves every county across the state.





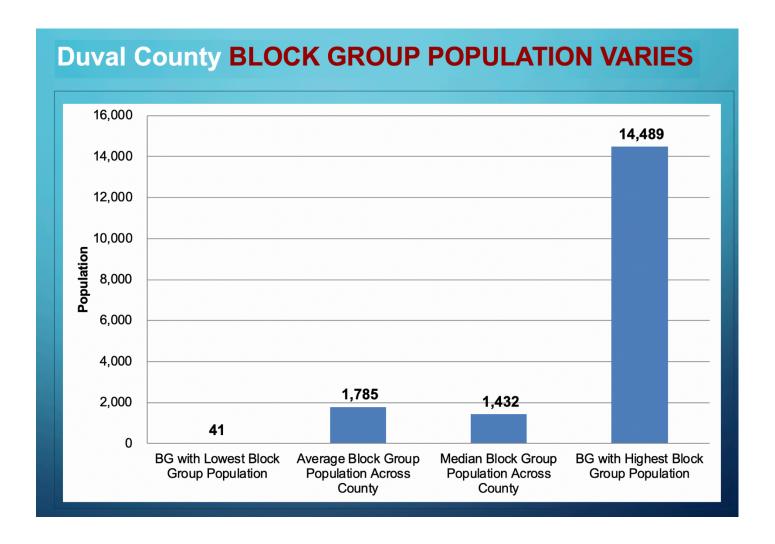
MAP LISTING & DESCRIPTION

1. Baseline Map

General map that shows features of the county.

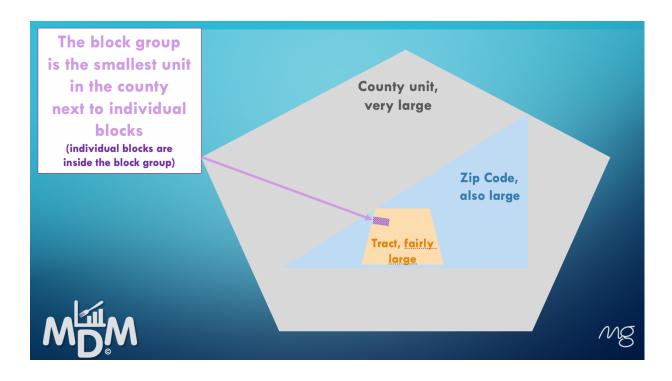
2. Block Group ID Map

This is a key code map used to identify the location of specific block groups. Block groups consist of small clusters of individual blocks, and block group population can vary. Here are the details for Duval County, as an example.



Overall, the Census attempts to draw boundaries based on population in a way that would make block groups comparable, although, in reality, they can have a wide range in population totals. The Duval block group with the highest population is an outlier; it is far from the norm. Duval has a total of 489 block groups. As shown in the next illustration, block groups are the smallest Census-defined geographic unit after blocks.





Many counties have urban, suburban, and rural areas. Many rural block groups appear large on the map in terms of land area; this is because rural block groups have lower population density and are thus larger in land area than urban block groups. Comparatively small urban or suburban block groups have block group IDs that are hard to see on the map when first opened. Simply increase the "percentage shown" number (usually located at the top of the PDF) to enlarge features including these numbers. Because maps are high resolution, they can be enlarged substantially without features becoming blurry or distorted.

MG block group IDs begin at single digit numbers for every county. For example, Leon County has 177 block groups. Numbering begins at #1 and ends at #177. Liberty County has 6 block groups. Numbering begins at #1 and ends at #6. MG plans to release an Excel spreadsheet with the over 11,400 block group results, which will include MG's short ID and the long ID from the Census.

3. SNAP-only Map

Shows individual SNAP-authorized retailers as dots on the map.

Block groups are examined and reconfigured every 10 years by the Census Bureau.

High population density block groups are usually small in land area.

Low population density block groups are usually large in land area.

Increase the "percentage shown" number (usually located at the top of the PDF) to enlarge block group IDs.



4. Households (HHs) Without a Car Map

Shows the numbers of households by five breakouts that do not own at least one automobile.

5. Households (HHs) Without Computer Internet Access in the Household Map

Shows the numbers of households by five breakouts that do not have access to a traditional computer or laptop with internet access within the household. Many Florida households do not have traditional computer internet access in the household. For example, Dixie County has a weighted score of 49% of households without internet access in the household, and the Dixie County map shows how lack of access distributes across all county block groups.

Internet access impacts ability to work from home. A few key points to eliminate confusion: (1) our unemployment without pay estimate is reliable and is based on specific Florida job categories factoring in the ability to work remotely off-site from home; (2) internet-related scores at the county level shown in the table in the Executive Summary are based on block group estimates from the most recent American Community Survey for all 11,400-plus Florida block groups; (3) block group level scores allow local leaders to assess block group conditions when utilizing maps or our detailed spreadsheet, but note that our county scores (calculated up from the block group level) might be slightly different from other estimates updated more frequently but generated instead across the county level; (4) internet access in the home does not include internet access via smart phone or other small devices; and (5) we did not need to include traditional home internet access as an input into our unemployment projection. This last point is the most important. We were surprised at the number of households without traditional home internet access, and some county leaders might be as well, but please note that these numbers were not nor did they need to be factored into our employment disruption projections.

6. COVID-19 Unemployment Map

Shows the number of recently unemployed workers as a direct result of the pandemic. The overall goal of Feeding Florida in the commissioning of this body of work was to estimate how many meals are missed by Florida's newly unemployed population so that the Feeding Florida network – which serves every county throughout the state – can prepare to address the COVID-19 crisis. Our first objective to address this goal was to estimate how many meals are missed by this newly unemployed population because households can no longer afford them. To do that, we generated estimates of COVID-19 employment disruption at small geographic units across Florida. Our analysis estimates how many additional workers in a block group (i.e. over and above the baseline pre-COVID-19 level of unemployment) have become unemployed by either (1) the direct shutdown of businesses (such as bars, restaurants, and schools), or (2) the social distancing regulation that makes some work impossible to perform in a traditional workplace or remotely at home, where social distancing can be observed. More details on the methodology are available in the Executive Summary.



7. Number of Workers Pre-COVID-19 Employed Age 65 & Over Map

Another project objective was to detail elder vulnerability during this crisis. This includes maps and data tables showing residential locations of Florida elders who though of retirement age – are or recently were in the workforce. Most of them likely continued working past retirement age because they have few assets and have a history of being in a low-to-moderate income category. These are the seniors that likely require ongoing income for daily needs, such as groceries. These senior jobs are usually low-tech and high-touch in terms of public interaction. Those in an essential high touch job, such as grocery cashier, who continue to work, are putting themselves at a high health risk. Most, however, likely lost employment and are in need of grocery support.

8. Weekly Average Meal Deficit Resulting From COVID-19

This shows the average number of missing meals per week by household resulting only from the pandemic. The core objective was to estimate how many meals are missed by this newly unemployed population, accounting for all other ways these households might acquire meals and groceries, but by design excluding any post-COVID-19 stimulus money or new increases in SNAP that might occur as a result only of the pandemic. This is an update of our Meal Deficit Metric (MDM) model recently released for every block group across Florida. Our results were statistically significant at the block group level.

The MDM calculates the unmet food gap at this very low geography after "netting out" (1) government food subsidies such as SNAP and free-or-reduced-price school meals, (2) charitable food provided through pantries and other organizations, and (3) all other ways that households might acquire food, including support from friends and relatives. Again, the MDM predicts meals that are missed because households cannot afford them. This is distinct from dieting and fasting for reasons not related to food affordability. The pre-COVID-19 meal deficit (released in March of 2020 and also sponsored by Feeding Florida) was already higher than previously understood – almost 17 million meals per week. This high figure is because past studies by other groups did not (1) look at all households of all income levels across Florida, (2) use only Florida-specific data as inputs into their models, or (3) net out missing meals after accounting for all food subsidies such as government feeding programs like SNAP or WIC. Consider, for example, Palm Beach County. MG's pre-COVID-19 analysis showed that missing meals were underestimated by other studies for that county by over 60%.

> MG's pre-COVID-19 analysis showed that missing meals in Florida were substantially underestimated by other studies.



9. Total Weekly Missing Meals Pre-and-post-COVID19

Shows current TOTAL missing meals (not the average) by block group, accounting for all other ways these households might acquire meals and groceries, excluding any post-COVID-19 stimulus money or new increases in SNAP that might occur as a result of the pandemic. Again, we must emphasize that this figure is high (almost 20 million weekly missing meals across all of Florida) because past studies by other groups did not (1) look at all households of all income levels across Florida, (2) use only Florida-specific data as inputs into their models, or (3) net out missing meals after accounting for all food subsidies such as government feeding programs like SNAP or WIC. Consider, for example, Palm Beach County. MG's pre-COVID-19 analysis showed that missing meals were underestimated by other studies for that county by over 60%.

Because maps show totals by county, each county will have its own unique breakout. The legends on maps are thus customized for each county.

10. Hot Spot Maps

To explain these hot spot maps, let us first refer to the pre-COVID employment of age 65 and older maps (#7 above) and the total preand-post-COVID-19 missing meal maps (#9 above), which are detailed in five breakouts county by county.

Hot spot maps show the best locations in each county for mobile pantries

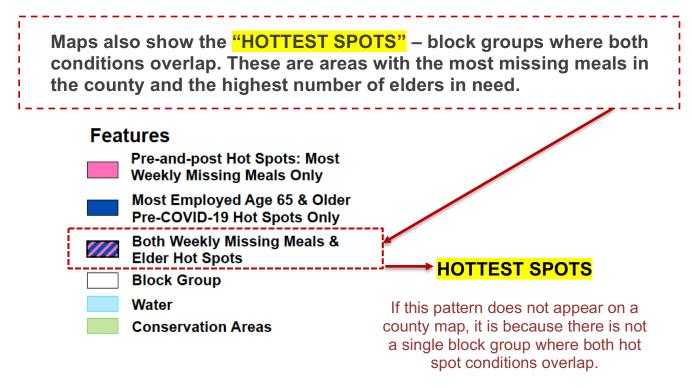
Hot spot maps use the "worst" top breakout for each of these two conditions. Hot Spot maps (#10 in county folders) detail only the highest breakout for both #7 and #9 maps

Most of the 65 and older elders (again, detailed in the #7 maps) likely continued working past retirement age because they have few assets and have a history of being in a low-to-moderate income category. These are the seniors that likely require ongoing income for daily needs, such as groceries. These senior jobs are usually lowtech and high-touch in terms of public interaction. Those in an essential high touch job, such as grocery cashier, who continue to work, are putting themselves at a high health risk. Most, however, likely lost employment and are in need of grocery support.

The total missing meals maps (#9) shows the pre-and-post-COVID-19 meal deficit for the entire county population living in households (not just all seniors or seniors over-65-and-working pre-COVID-19). We specify "living in households" as the meal deficit, by design, excludes populations living in group guarters (such as nursing homes or prisons).

Block groups shaded on these hot spot maps show the greatest need for these two conditions (missing meal totals of the entire population and also elders over 65 years of age that were working pre-COVID-19).





Hot spots are small community areas where a mix of high-need households reside. Pinpointing food relief to these areas through mobile pantries addresses two pressing concerns: (1) immediate hunger and nutritional needs and (2) reducing the need for household family members to put their own family members and other families living nearby at risk because they are desperate to find food. The hottest spots are where elders previously or currently working also need grocery and overall support so that they do not need to expose themselves or others to unnecessary health risks searching for food or work as a means to purchase food.

FOR MORE INFORMATION

