

# Comparing Healthcare Utilization Among Hispanic Medicare Beneficiaries with Complex Chronic Conditions: A Comparison of Puerto Rico and Florida

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## Overview

This study compares the prevalence and demographic profile of Medicare fee-for-service (FFS) beneficiaries with multiple complex chronic conditions (MCCs) in Puerto Rico (PR) and Florida (FL). We then explore healthcare utilization patterns across the two populations.

## Background

- Puerto Rico (PR) has one of the oldest populations in the U.S. (24% of the population aged 65+)
- Despite higher rates of chronic conditions such as dementia, diabetes, and chronic kidney disease, Medicare spending per beneficiary in Puerto Rico (PR) remains significantly lower than on the U.S. mainland (Campos & Rivera-Hernandez, 2024)
- Lower spending may be associated with lower healthcare utilization on the island, however there is limited information on Medicare spending and utilization patterns among FFS beneficiaries in PR.
- Thus, this study compares the prevalence, demographics, and healthcare use of Medicare FFS beneficiaries (65+) with multiple complex chronic conditions (MCCs) in Puerto Rico and Hispanic beneficiaries in Florida.

## Study Design

- **Data:** 2022 data from the Medicare Beneficiary Summary File (MBSF), including the Cost and Utilization Segment and the 30 CCW Chronic Conditions Segment
- **Sample population:** Eligible beneficiaries were ≥65 yrs old, Hispanic, non-dual eligible, and continuously enrolled in Medicare Parts A and B
- **Sub-groups:** Within each state, Puerto Rico and Florida, we stratified by multiple complex chronic conditions (MCCs; 2+ complex conditions) for comparison purposes
- **Outcomes:** Utilization (zero vs. any use) across 17 Medicare spending categories within 4 main domains: hospital services, physician services, post-acute care, and other services
- **Analysis:** We ran Chi-square and ANOVA tests to compare demographics, and logistic regression models to estimate service use differences, adjusting for key covariates. Log-odds were converted to predicted probabilities for interpretation

## Results

Figure 1: Predicted Probabilities of Healthcare Utilization Among PR and FL Beneficiaries with MCCs

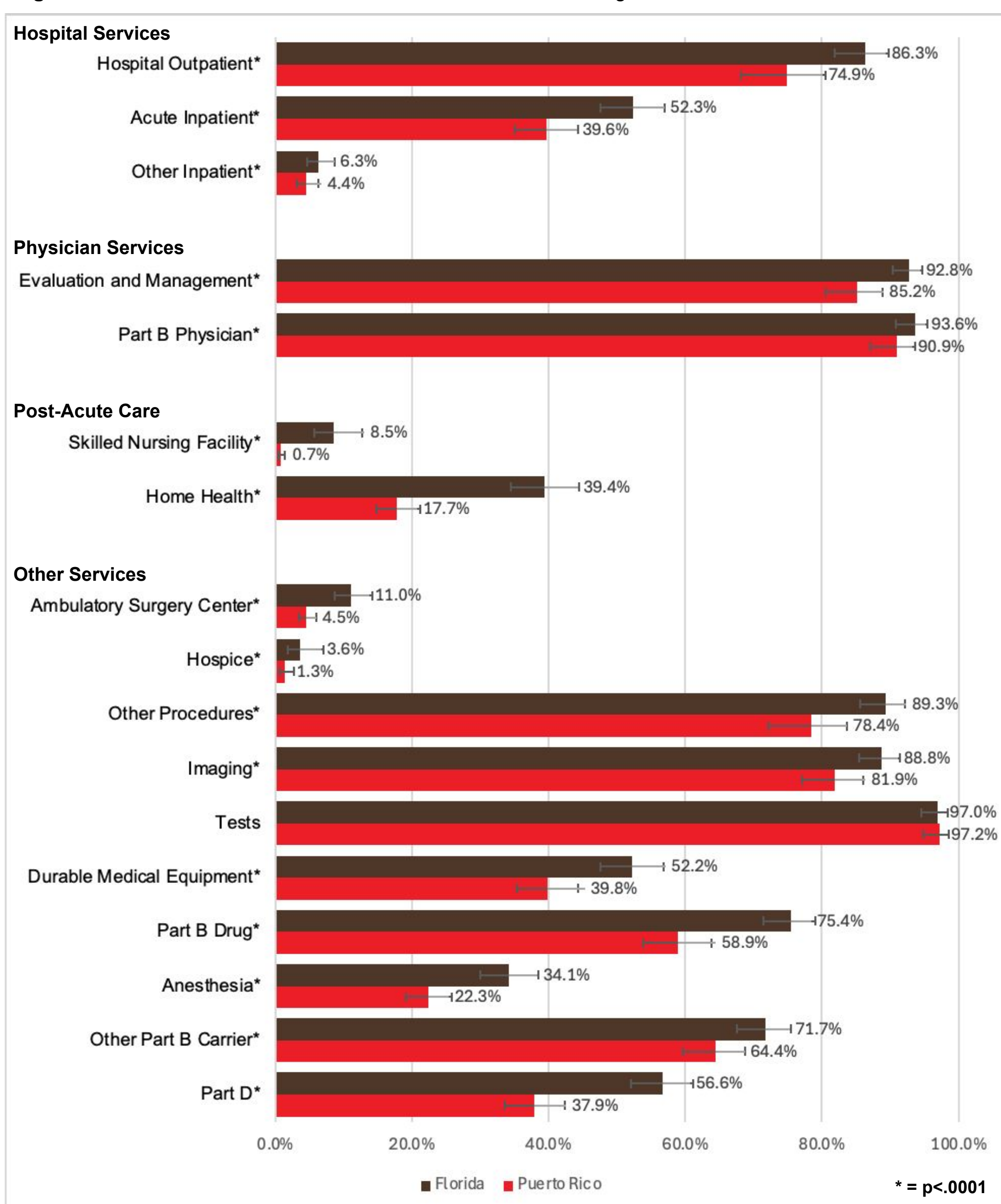


Table 1: Demographic Characteristics of Medicare FFS Beneficiaries From PR and FL by MCCs Status

Demographics	Puerto Rico (n=25950)		Non-Multiple Complex (0-1)		Florida (n=65923)		Non-Multiple Complex (0-1)		P-value
	n	%	n	%	n	%	n	%	Chi-Square
Eligible Population (n)	4965	19.15	20963	80.85	12036	18.26	53887	81.74	All Groups
Sex									<.0001
Male	1941	39.09	9350	44.60	5431	45.12	24248	45.00	
Female	3024	60.91	11613	55.40	6605	54.88	29638	55.00	
Age (Mean, SD)	80.73 (7.88)		76.59 (7.89)		79.64 (7.95)		74.04 (6.84)		<.0001
Original Reason for Medicare									<.0001
Old Age and Survivors Insurance	3934	79.23	17658	84.23	10275	85.37	49271	91.43	
Disability / ESRD	1031	20.76	3305	15.94	1761	14.63	4616	8.57	

## Conclusion

- Among FFS beneficiaries, 19.15% of PR beneficiaries had MCCs, compared to 18.26% in FL
- PR beneficiaries were significantly less likely than FL beneficiaries to have a claim in 16 of 17 spending categories for those with MCCs and in 14 of 17 categories for those without MCCs (both p < .0001)
- Despite similar MCCs prevalence, health services utilization in PR is significantly lower for both MCC and non-MCC beneficiaries
- Lower Medicare spending per beneficiary in PR appears to reflect reduced service use rather than a lower disease burden
- These findings highlight potential access and quality-of-care issues in PR, with implications for Medicare Advantage (MA) benchmarks

## Funding Source and Key References

**Funding:** RF1AG078262

### Key References:

1. Campos, M., & Rivera-Hernandez, M. (2024). TRENDS IN CHRONIC DISEASE SPENDING AND HEALTH OUTCOMES AMONG MEDICARE FFS BENEFICIARIES IN PUERTO RICO. *Innovation in Aging*, 8(Suppl 1), 1222–1223. <https://doi.org/10.1093/geronil/igae098.3913>
2. Carrion-Baralt, J. (2023). PREVALENCE AND PAYMENTS PER CAPITA OF ADRD IN PUERTO RICO AND THE US: ESTIMATES FROM MEDICARE DATA. *Innovation in Aging*, 7(Suppl 1), 855.
3. Rivera-Hernandez, M., Kumar, A., Chou, L. N., Keeney, T., Ferdows, N., Karmarkar, A., ... & Ottenbacher, K. (2022). Healthcare utilization and costs among high-need and frail Mexican American Medicare beneficiaries. *PloS one*, 17(1), e0262079.