

Background

Consistent with national studies that strongly suggest persistent racial disparities in access to behavioral health care, underutilization of mental health outpatient services, and prescriptions for novel antipsychotic and antidepressant medications, a study on quality of care in Philadelphia in 1996 (Kuno & Rothbard, 2005) found that Community Mental Health Centers located in high income, predominantly white areas had higher quality of care indicators, such as quicker follow-up with outpatient services following hospital discharge and greater continuity of care in the community than those in low income, African American areas.

Study Objective

This study is a follow-up to a prior study that examined the extent to which racial disparities existed in the Philadelphia public mental health system in 1993 and examines the extent that racial disparities continue to exist in the Philadelphia public mental health system in 2005. Possible explanations and the usefulness of GIS methods for identifying areas of focus to address the problem are discussed.

Methods

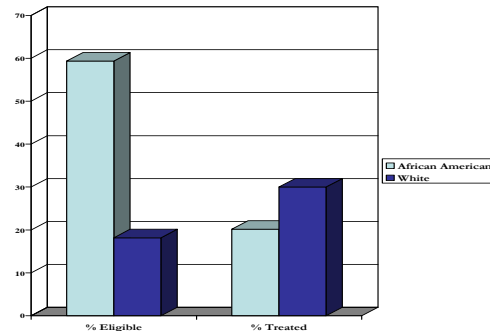
A cross-sectional, observational analysis of 224,654 adult Medicaid recipients in Philadelphia's public sector managed care behavioral health plan was employed to identify treated individuals aged 18 to 64 years from 2005 enrollment and claims records. The study also examined disparities in the type and intensity of services. Hispanic enrollees and users were excluded from the analysis due to data reporting irregularities. GIS methods were used to map outpatient psychiatric service utilization and provider location in order to examine the extent to which geographical location may explain racial disparities in the treatment of mental health disorders.

Results

Disparities in Enrollment and Utilization Rates

While African Americans had higher Medicaid enrollment rates than Whites (59.4% vs 18.2%), they continue to have lower rates of treatment for mental health disorders (20.2% vs 30.0%). Further, African Americans were less likely than Whites to be enrolled in SSI (24.7% vs 31.3% - not shown).

Figure 1. Medicaid Eligibility and Mental Health Service Utilization by Race, 2005.



Disparities in Type of Service Utilization.

African Americans had lower rates of all categories of services (psychiatric and substance abuse inpatient hospitalization, emergency room visits and outpatient services) with the most pronounced difference in utilization rates of medication management and psychotherapy.

A sub-analysis comparing African Americans and Whites diagnosed with Major Depressive disorder (not shown) suggests that African Americans were more likely to receive medication only while whites were more likely to receive combined medication and psychotherapy.

Results (cont.)

Table 1. Disparities in Types of Mental Health Service Utilization.

	% of Eligible Black (N=133,343)		% of Eligible White (N=40,880)	
	N	%	N	%
Psych Inpatient	4,201	3.2	1,889	4.6
Psych Outpatient	16,725	12.5	8,276	20.2
Psychotherapy	9,477	7.1	4,802	11.8
Medication Mgmt	8,411	6.3	4,785	11.7
Targeted Case Mgmt	2,723	2.0	1,337	3.3
Psych ER	3,927	3.0	1,752	4.3
D/A Inpatient	4,116	3.1	1,987	4.9
D/A Outpatient	9,649	7.2	3,988	9.8
Partial Psych	2,171	1.6	871	2.1
Other Outpatient	665	0.5	542	1.3

Disparities in Intensity of Service Use.

Whites who utilize outpatient psychiatric or substance abuse services have higher treatment intensity (more services) than do African Americans who utilize these types services. African Americans hospitalized for substance abuse have longer stays on average than do Whites.

Table 2. Disparities in Intensity of Service Use

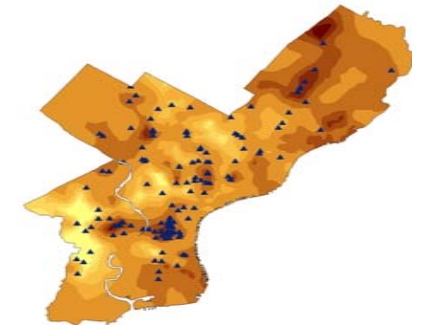
	African Americans					Whites				
	N	Mean	Median	Mode	Min-Max	N	Mean	Median	Mode	Min-Max
Psych Outpatient (Any)	16,725	16.7	7.0	1.0	1-125 (16%)	8,276	20.0	10.0	1.0	1-248 (12%)
Psychotherapy	9,477	8.1	5.0	1.0	1-115	4,802	12.6	8.0	1.0	1-132
Med Mgmt	8,411	4.9	4.0	1.0	1-104	4,785	4.9	4.0	1.0	1-93
Targeted Case Mgmt	2,723	48.4	46.0	56.0	1-217	1,337	51.2	47.0	32.0	1-234
D/A Inpatient (Days)	4,116	42.8	28.0	4.0	1-360	1,997	36.0	26.0	5.0	1-365
D/A Outpatient (Any)	9,649	52.4	16.0	1.0	1-535	3,988	143.6	55.0	1.0	1-547
Psychotherapy	5,444	18.5	12.0	1.0	1-231	2,732	23.5	16.5	1.0	1-248
Methadone Maintenance	1,179	224.1	248.0	364	1-392	2,163	204.6	206.0	365.0	1-367
Intensive Outpatient	4,753	25.7	19.0	1.0	1-168	1,651	32.8	23.0	2.0	1-174

Results (cont.)

Geographic Location of Psychiatric Outpatient Providers.

Mapping of outpatient providers overlaid on a map of outpatient service utilization indicates that higher service use (dark-shaded areas) tends to be accompanied by higher number of providers in the neighborhood, whereas providers are more geographically-dispersed in areas where outpatient psychiatric service utilization is low (light-shaded areas). African Americans are highly concentrated in low-service areas.

Figure 2. Psychiatric Outpatient Providers and Areas of Service Utilization. *



*See Poster Session 200379 (Nov. 10, 2009 10:45 AM) for technical description of mapping and spatial data analysis for this study.

Discussion

- Race continues to be associated with the type and intensity of treatment for mental health disorders in the Philadelphia public sector.
- Providers are more geographically dispersed in low service areas, indicating a possible mismatch between service mix and population needs.
- Policy initiatives suggested by this study involve analyses of provider capacity and accessibility for neighborhoods with low mental health service utilization.