# Rural Health Research RECAP



August 2023

# Rural Behavioral Health Workforce

Funded by the Federal Office of Rural Health Policy (FORHP), within the Health Resources and Services Administration (HRSA), the Rural Health Research Gateway disseminates work of the FORHP-funded Rural Health Research Centers (RHRCs) to diverse audiences. This resource provides a summary of recent research, conducted by the WWAMI RHRC, on the behavioral health workforce.

The Health Resources and Services Administration has designated Mental Health Professional Shortage Areas (MHPSA) identifying areas that lack professionals who can provide mental and behavioral health services. As of March 31, 2023, there were 4,040 MHPSAs in rural areas, with 2,141 practitioners needed to remove the designations. This recap examines the behavioral health workforce, including the distribution of social workers, psychologists, psychiatric nurse practitioners, counselors, and psychiatrists.

### Social Workers, 2014-2021

From 2014 to 2021, both rural and urban areas experienced increases in the supply of social workers, including clinical social workers and school social workers.<sup>2</sup>

In 2014, 30.8% of rural counties and 9.8% of urban counties lacked any social worker.<sup>2</sup> By 2021, 21.8% of rural counties and 5.4% of urban counties lacked a social worker.<sup>2</sup> See Table 1. The ratio of social workers per 100,000 residents also increased from 2014 (34.5 in rural counties; 58.2 in urban counties) to 2021 (57.7 in rural counties; 96.4 in urban counties).<sup>2</sup> See Table 2.

# Psychologists, 2014-2021

Data for psychologists included those with specialties in substance use disorder, adult development and aging, clinical, clinical child and adolescent, cognitive and behavioral, counseling, educational, family, group psychotherapy, health, health service, intellectual and developmental disabilities, prescribing (medical), psychoanalysis, psychotherapy, rehabilitation, school, and women.<sup>3</sup>

In 2014, 48.5% of rural counties and 19.2% of urban counties had no psychologists.<sup>3</sup> By 2021, these percentages had decreased slightly to 45.3% of rural counties and 15.7% of urban counties.<sup>3</sup> See Table 1. The ratio of psychologists per 100,000 residents also increased from 2014 (12.8 in rural counties; 30.8 in urban counties) to 2021 (15.8 in rural counties; 39.5 in urban counties).<sup>3</sup> See Table 2.

### **Psychiatric Nurse Practitioners, 2014-2021**

Psychiatric nurse practitioners were defined to include both psychiatric and mental health nurse practitioners.<sup>4</sup> Among the five types of behavioral health providers studied, access to a within-county psychiatric nurse practitioner was least common.<sup>4</sup> In 2014, 82.5% of rural and 45.7% of urban counties had no psychiatric nurse practitioner.<sup>4</sup> By 2021, 68.5% of rural and 30.9% of urban counties lacked a psychiatric nurse practitioner.<sup>4</sup> See Table 1.

In 2014, psychiatric nurse practitioners had the lowest ratio per 100,000 residents among the five behavioral health workforce provider types, with 1.4 in rural counties and 1.9 in urban counties.<sup>4</sup> By 2021, psychiatric nurse practitioners had a ratio of 3.4 in rural and 4.8 in urban counties per 100,000 residents.<sup>4</sup> See Table 2.

Table 1. Percent of Counties without Behavioral Health Professionals, 2014-2021<sup>2,3,4,5</sup>

Profession	County Type	2014	2015	2016	2017	2018	2019	2020	2021
Social Workers	Rural	30.8%	27.4%	26.7%	26.0%	25.1%	23.9%	22.6%	21.8%
	Urban	9.8%	8.8%	7.9%	7.6%	7.0%	6.8%	6.4%	5.4%
Psychologists	Rural	48.5%	47.5%	47.3%	47.8%	47.2%	46.2%	45.4%	45.3%
	Urban	19.2%	18.8%	18.8%	18.1%	17.0%	16.0%	15.6%	15.7%
Psychiatric Nurse Practitioners	Rural	82.5%	81.2%	79.9%	79.0%	77.4%	74.4%	71.0%	68.5%
	Urban	45.7%	42.4%	42.0%	41.4%	39.5%	36.1%	33.0%	30.9%
Counselors	Rural	26.1%	23.6%	22.7%	21.8%	21.1%	20.2%	19.6%	18.4%
	Urban	9.3%	7.3%	7.0%	6.4%	5.7%	5.5%	5.1%	4.6%

Table 2. Behavioral Health Professionals per 100,000 Residents, 2014-2021<sup>2,3,4,5</sup>

Profession	County Type	2014	2015	2016	2017	2018	2019	2020	2021
Social Workers	Rural	34.5	38.9	41.4	44.3	47.7	51.7	55.0	57.7
	Urban	58.2	65.3	68.6	73.0	78.5	84.8	90.0	96.4
Psychologists	Rural	12.8	13.7	14.0	14.3	14.7	15.1	15.5	15.8
	Urban	30.8	32.7	33.4	34.1	35.7	36.8	37.9	39.5
Psychiatric Nurse Practitioners	Rural	1.4	1.6	1.8	1.8	2.0	2.5	3.1	3.4
	Urban	1.9	2.2	2.3	2.6	2.9	3.6	4.3	4.8
Counselors	Rural	46.7	53.9	58.5	65.2	71.6	75.6	80.3	87.7
	Urban	64.5	76.2	83.1	93.3	102.1	110.1	118.6	131.2

### Counselors, 2014-2021

Data for counselors included substance use disorder counselors, pastoral counselors, professional counselors, school counselors, marriage and family therapists, poetry therapists, psychoanalysts, behavioral analysts, and clinical neuropsychologists.<sup>5</sup>

Among the five provider types studied, access to a within-county counselor was most common.<sup>5</sup> In 2014, 26.1% of rural and 9.3% of urban counties had no counselor available.<sup>5</sup> These percentages decreased by 2021, when 18.4% of rural and 4.6% of urban counties lacked a counselor.<sup>5</sup> See Table 1. Additionally, counselors had the highest ratio of providers per 100,000 residents.<sup>5</sup> In 2014, there were 46.7 counselors per 100,000 people in rural counties and 64.5 counselors per 100,000 people in urban counties.<sup>5</sup> By 2021, there were 87.7 in rural and 131.2 in urban counties.<sup>5</sup> See Table 2.

## Psychiatrists, 1995-2019

Psychiatrists in this study included those with a Doctor of Medicine or Doctor of Osteopathic Medicine degree.<sup>6</sup> The disparity between rural and urban counties lacking psychiatrists was pronounced. In 1995, 71.6% of rural counties and 32.0% of urban counties had no psychiatrist.<sup>6</sup> By 2019, 70.2% of rural counties were still without a psychiatrist, but the percentage urban counties without a psychiatrist had decreased to 27.1% (not tabled).<sup>6</sup>

Additionally, psychiatrists were the only provider type where the ratio per 100,000 residents declined in both rural and urban counties over the study period.<sup>6</sup> In 1995, rural counties had 3.7 psychiatrists per 100,000 residents, compared to 14.7 per 100,000 in urban counties.<sup>6</sup> However, these numbers decreased to 3.5 and 13.0, respectively, by 2019 (not tabled).<sup>6</sup>

## **Behavioral Health Workforce by Region**

Regardless of the type of behavioral health professional, the West North Central and West South Central Census Divisions consistently had the highest percentage of counties without behavioral health professionals.<sup>2,3,4,5,6</sup>

However, some variation exists when comparing Census Divisions by the behavioral health workforce per 100,000 residents. In 2021, the West South Central Division had the lowest ratio of social workers (29.9 rural and 46.2 urban), psychologists (7.7 rural and 18.5 urban), and psychiatric nurse practitioners for rural counties (1.7).<sup>2,3,4</sup> The East North Atlantic Division had the lowest ratio of psychiatric nurse practitioners for urban counties (3.3).<sup>4</sup> Counties in the East South Central Division had the lowest ratio of counselors (52.1 rural and 78.9 urban).<sup>5</sup>

### Resources

- Health Resources and Services Administration (2023). Designated Health Professional Shortage Areas Statistics, Second Quarter Summary, data.hrsa.gov/Default/GenerateHPSAQuarterlyReport.
- WWAMI Rural Health Research Center (2022). Changes in the Supply and Rural-Urban Distribution of Social Workers in the U.S., 2014-2021, ruralhealthresearch.org/publications/1539.
- 3. WWAMI Rural Health Research Center (2022). Changes in the Supply and Rural-Urban Distribution of Psychologists in the U.S., 2014-2021, ruralhealthresearch.org/publications/1538.
- WWAMI Rural Health Research Center (2022). Changes in the Supply and Rural-Urban Distribution of Psychiatric Nurse Practitioners in the U.S., 2014-2021, ruralhealthresearch.org/publications/1537.
- WWAMI Rural Health Research Center (2022). Changes in the Supply and Rural-Urban Distribution of Counselors in the U.S., 2014-2021, ruralhealthresearch.org/publications/1535.
- WWAMI Rural Health Research Center (2022). Changes in the Supply and Rural-Urban Distribution of Psychiatrists in the U.S., 1995-2019, ruralhealthresearch.org/publications/1536.

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