OBSERVATIONS: BRIEF RESEARCH REPORTS

Early Uptake of the Acute Hospital Care at Home Waiver

Background: Hospital at home (HaH) provides acute hospital-level care in a patient's home as a substitute for traditional inpatient hospital care. The HaH model has been the subject of multiple randomized controlled trials and systematic reviews and has been shown to provide safe, high-quality, patient-centered care (1–4). Despite a robust evidence base, dissemination of HaH has been limited. One important barrier to scaling HaH has been the lack of a payment mechanism in traditional fee-for-service Medicare.

To help meet the challenges of delivering health care services in the midst of the COVID-19 pandemic, the Centers for Medicare & Medicaid Services (CMS) issued "Hospitals Without Walls" regulatory guidance that waived certain physical environment and Life Safety Code Medicare hospital conditions of participation. As the COVID-19 pandemic continued, on 25 November 2020, CMS announced a comprehensive strategy to enhance hospital capacity, including the Acute Hospital Care at Home (AHCaH) individual waiver. For the duration of the public health emergency, the program provides a hospital-level waiver that waives the requirement for 24/7 onsite nursing. Hospitals with waivers must follow all other conditions of participation, attest that they will be able to provide hospital-level services in patients' homes, and commit to reporting data on their program outcomes to CMS on a regular basis. Hospitals qualifying for the individual waiver receive the full hospital-level diagnosis-related group payment for services provided at home.

Objective: To describe early uptake of the AHCaH waiver in the United States.

Methods: We analyzed data from the AHCaH CMS dashboard, including applicant volume and characteristics. We linked hospitals holding a waiver to the American Hospital Association's 2019 Annual Survey to determine hospital characteristics. Two hospitals that opened recently and were not in the survey were omitted.

Findings: Between 25 November 2020 and 29 July 2021, 144 hospitals in 66 health systems were approved for the

Table. Characteristics of Hospitals With and Without the AHCaH Waiver

Characteristic	AHCaH Hospitals (*n* = 144)*	Non-AHCaH Hospitals (*n* = 4649)*	Percentage With AHCaH Waiver (95% CI)
Total beds, *n (%)*			
<100	20 (13.9)	2452 (52.7)	0.8 (0.5–1.2)
100–299	51 (35.4)	1450 (31.2)	3.4 (2.5–4.3)
>299	73 (50.7)	747 (16.1)	8.9 (7.0–10.9)
Mean total admissions per year (95% CI), *n*	20 215 (17 634–22 796)	6797 (6518–7076)	–
Mean average daily census (95% CI)	621 (527–715)	219 (211–227)	–
Mean full-time equivalents (95% CI)			
Total personnel	3555 (2836–4273)	1096 (1046–1146)	–
Total hospitalists†	44 (38–51)	17 (17–18)	–
Total nurses‡	1173 (951–1395)	368 (347–389)	–
Ownership, *n (%)*			
For-profit	11 (7.6)	782 (16.8)	1.4 (0.6–2.2)
Government	19 (13.2)	1141 (24.5)	1.6 (0.9–2.4)
Nonprofit	114 (79.2)	2726 (58.6)	4.0 (3.3–4.7)
Teaching status, *n (%)*			
No teaching	26 (18.1)	2556 (55)	1.0 (0.6–1.4)
Minor teaching	80 (55.6)	1842 (39.6)	4.2 (3.3–5.1)
Major teaching	38 (26.4)	251 (5.4)	13.2 (9.2–17.1)
Geography, *n (%)*§			
Rural	1 (0.7)	1067 (23)	0.1 (0–0.3)
Metropolitan	133 (92.4)	2820 (60.7)	4.5 (3.8–5.3)
Micropolitan	10 (6.9)	762 (16.4)	1.3 (0.5–2.1)
Hospital-owned home health services, *n (%)*‖			
Yes	30 (22.6)	772 (22.8)	3.7 (2.4–5.1)
No	103 (77.4)	2619 (77.2)	3.8 (3.1–4.5)

AHCaH = Acute Hospital Care at Home.
* Percentages represent column percentages.
† 21 AHCaH hospitals and 2552 non-AHCaH hospitals were missing.
‡ 21 AHCaH hospitals and 1859 non-AHCaH hospitals were missing.
§ Core-based statistical area types as per the Office of Management and Budget. Metropolitan is defined as having a population with ≥1 urbanized area of 50 000 people. Micropolitan is defined as having a population ≥10 000 but <50 000. Both require adjacent territory that has a high degree of social and economic integration.
‖ 11 AHCaH hospitals and 1258 non-AHCaH hospitals were missing.

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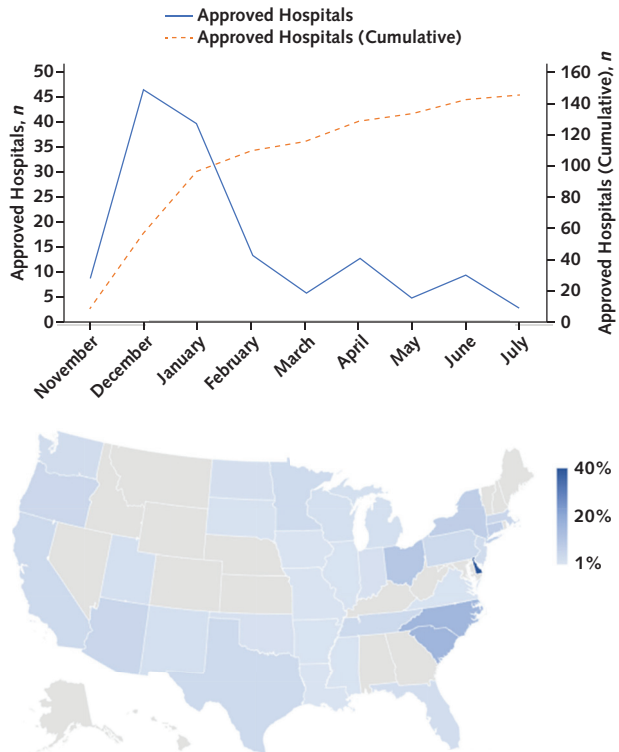
Figure. Temporal trend and geographic distribution of hospitals with an acute hospital care at home waiver.



Top. Temporal trend of approval of acute hospital care at home waivers. **Bottom.** Geographic distribution of hospitals with an acute hospital care at home waiver. Percentages refer to the number of hospitals with a waiver out of all hospitals in a particular state. Gray shading indicates states without waivers. States where >5% of hospitals had waivers included Delaware (40%), North Carolina (16%), South Carolina (16%), Ohio (10%), New York (8%), and Connecticut (8%).

AHCaH individual waiver (**Table**), with a stable but lower rate of hospital waivers approved after the first few months (**Figure**, *top*). Hospitals with waivers represented 32 states in 69 health referral regions (**Figure**, *bottom*). Most were nonprofit hospitals (79%), were minor teaching hospitals (56%), were metropolitan hospitals (92%), and had more than 299 beds (51%). Twenty-three percent owned their own home health agencies.

Overall, few hospitals that received waivers were rural (0.09%), had fewer than 100 beds (0.8%), and did not have teaching programs (1.0%) (**Table**). In contrast, rapid uptake was seen in major teaching (13.2%), large (8.9%), and metropolitan hospitals (4.5%). Delaware (40%), North Carolina (16%), and South Carolina (16%) had the highest percentages of waiver adoption (**Figure**, *bottom*).

Discussion: Early analysis of the AHCaH individual waiver suggests rapid uptake and a strong appetite across a diverse array of hospitals, with the potential for significant capacity creation with a stable but slower uptake over time. The COVID-19 pandemic has greatly accelerated interest in HaH as hospitals and health systems have sought to implement approaches to increase hospital capacity. CMS deployed a new tool for capacity creation and processed individual waiver requests expeditiously.

In contrast to rapid uptake among large hospitals (8.9%) and major teaching hospitals (13.2%), few rural hospitals (0.1%) have thus far received a waiver. Despite optimism about the potential of HaH to improve disparities among rural and urban areas of the United States, limited resources to launch new care models at rural hospitals or requirements for patients to be within a certain distance of the hospital may limit effectiveness in these populations. Additional research and technical assistance tailored to rural areas may improve uptake; efforts on both fronts are ongoing (5). For-profit hospitals have similarly not yet substantially entered the scene.

Barriers to uptake may include the potentially temporary nature of the AHCaH individual waiver resulting in hesitancy of hospitals and health systems to commit to HaH implementation, local resource limitations during the pandemic, state regulations, and whether private payers will follow with similar payment mechanisms. Future data on case volume and patient outcomes will show whether the AHCaH individual waiver serves as the national tipping point toward a transformation of acute care to the home.

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Reproducible Research Statement: *Study protocol, statistical code, and data set:* Available from Dr. Levine (e-mail, dmlevine@bwh.harvard.edu).

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