VA versus Non-VA Quality of Care: A Living Systematic Review

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PREFACE

The VA Evidence Synthesis Program (ESP) was established in 2007 to conduct timely, rigorous, and independent systematic reviews to support VA clinicians, program leadership, and policymakers improve the health of Veterans. ESP reviews have been used to develop evidence-informed clinical policies, practice guidelines, and performance measures; to guide implementation of programs and services that improve Veterans' health and wellbeing; and to set the direction of research to close important evidence gaps. Four ESP Centers are located across the US. Centers are led by recognized experts in evidence synthesis, often with roles as practicing VA clinicians. The Coordinating Center, located in Portland, Oregon, manages program operations, ensures methodological consistency and quality of products, engages with stakeholders, and addresses urgent evidence synthesis needs.

Nominations of review topics are solicited several times each year and submitted via the <u>ESP website</u>. Topics are selected based on the availability of relevant evidence and the likelihood that a review on the topic would be feasible and have broad utility across the VA system. If selected, topics are refined with input from Operational Partners (below), ESP staff, and additional subject matter experts. Draft ESP reviews undergo external peer review to ensure they are methodologically sound, unbiased, and include all important evidence on the topic. Peer reviewers must disclose any relevant financial or non-financial conflicts of interest. In seeking broad expertise and perspectives during review development, conflicting viewpoints are common and often result in productive scientific discourse that improves the relevance and rigor of the review. The ESP works to balance divergent views and to manage or mitigate potential conflicts of interest.

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Operational Partners

Operational partners are system-level stakeholders who help ensure relevance of the review topic to the VA, contribute to the development of and approve final project scope and timeframe for completion, provide feedback on the draft report, and provide consultation on strategies for dissemination of the report to the field and relevant groups.

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Executive Summary

Evidence Synthesis Program

KEY FINDINGS

- ► This report updates an earlier review of evidence on the quality of VA care compared with non-VA care available through October 2024. Six additional studies published through October 2024 were included in this update, bringing the total number of relevant studies published since 2015 to 69 (24 of surgical care, 50 of non-surgical care, and 5 of both).
- Most available studies have found that the quality and safety of VA care is as good as, or better than, care in the community.
- ► Fewer studies have examined access to care, patient experience, and efficiency/cost of care. Findings from available studies are mixed but tend to favor VA care.

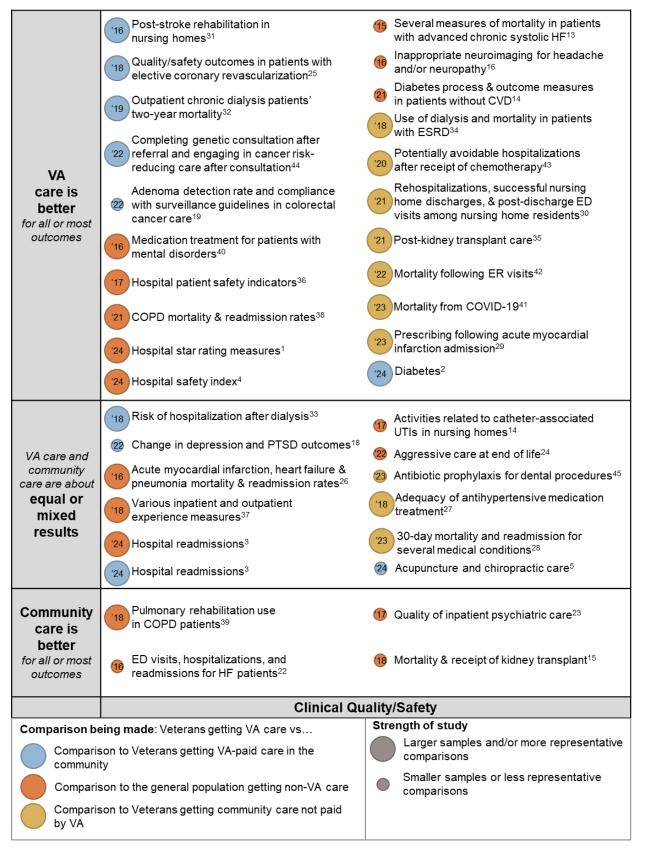
The Department of Veterans Affairs (VA) Veterans Health Administration (VHA) is the nation's largest integrated health care system. Comparing the quality of VA-delivered health care to care delivered in non-VA settings is one way of ensuring VA maintains its commitment to providing high-quality care to Veterans. To support this aim, the VA's Evidence Synthesis Program (ESP) maintains a living systematic review of studies comparing the quality of VA and non-VA health care, which is frequently updated with the most recently available evidence.

CURRENT REVIEW

To identify relevant studies, a research librarian conducted broad searches using terms relating to *Veterans health* and *community health services* or *private sector* in PubMed, APA PsycINFO, and Web of Science databases (1/1/2015–11/14/2024). Studies were included at either the abstract or the full-text level if they were original research studies of any design and made comparisons about the quality of care provided in VA Medical Centers and outpatient clinics compared with care provided in other health systems, *ie*, the general population. We included outcomes in any Institute of Medicine health care domain (clinical quality, safety, efficiency/cost, access, patient experience, or equity). Data were collected by 2 reviewers working independently, with any disagreements resolved by consensus.

From 2,911 titles, we identified 50 studies of non-surgical care meeting inclusion criteria. From 2,984 titles, we identified 24 studies of surgical care meeting inclusion criteria. Five studies contributed data to both. Characteristics and findings of included studies are summarized in the figures below. In each plot, the domains of care are listed on the horizontal axis (quality/safety, access, patient experience, cost/efficiency, equity), the results of the study are listed on the vertical axis (VA care is better than community care, VA care and community care are about equal, or results are mixed, and community care is better than VA care), and then each study is entered as a shape, with larger shapes being studies of better quality and representativeness than studies depicted by smaller shapes. The color of the shape indicates the type of comparison: blue for studies comparing Veterans getting care from VA to Veterans getting vA-paid care in the community; orange for studies comparing Veterans getting care from VA to Veterans getting care not paid by VA. Next to each shape is a brief thumbnail of what the study was about, and inside the shape is the year of publication ('18 = 2018, '19 = 2019, *etc*).

ES Figure 1. Evidence Map of Studies on the Quality of Non-Surgical Care



VA care is better for all or most outcomes	 Cardiology, gastroenterology, orthopedics, & urology wait times⁴⁸ Physical therapy, orthopedic care, optometry, & dental care decreases in wait times⁴⁷ Wait times in primary, mental health, & all other specialty care⁴⁹ Primary care, dermatology, cardiology, & orthopedics wait times⁴⁶ Receipt of influenza vaccine⁵⁶ 	 20 Outpatient primary, specialty, & mental health care patient-reported access to care⁵⁰ 21 Outpatient primary & specialty care patient-reported provider ratings⁵¹ 21 Prostate cancer patients receipt of guideline concordant care & imaging staging tests⁵³ 22 Downstream utilization and cost-related to low-value PSA testing⁵⁵ 22 Receipt of influenza vaccine⁵⁶ 	
	'24 End of life care⁵²'24 Hospital star rating measures¹	 Racial and socioeconomic disparities in patients with prostate cancer⁵⁷ Diabetes² 	
	Outpatient primary, specialty, & mental health care patient-reported provider ratings ⁵	¹¹⁷ Yelp ratings for hospitals ²⁰	
	Outpatient primary & specialty care patient-reported provider ratings ⁵¹	Cost/efficiency outcomes in patients with elective coronary revascularization ²⁵	
VA care and	Barriers to mental health care ¹⁸		
community care are about equal or mixed results	²² Patient centeredness in mental health care ¹⁸	18 Days of hospitalization after dialysis ³²	
	¹⁷ Numerous patient experience indicators ³⁶	Number of encounters for mental health care ¹⁸	
	'18 Numerous patient experience indicators ³⁷		
	'24 Hospital safety index ⁴	Total inpatient, outpatient, & drug costs for end-of-life cancer care ⁵⁴	
Community care is better for all or most outcomes	Access outcomes in patients with elective coronary revascularization ²⁵	Self-reported delay in care in last 12 months ¹⁷	
	Time to colonoscopy ¹⁹	Median distance to transplant center in miles ¹⁵	
	Cost and length of stay for patients with several medical conditions ²⁸	Hospital star rating measures ¹	
	Access, Patient Experien	ce, Cost/Efficiency, Equity	
Comparison be	l ping made: Veterans getting VA care vs	Strength of study	
	son to Veterans getting VA-paid care in the	Larger samples and/or more representative comparisons	
Comparison to the general population getting non-VA care Smaller samples or less reprint comparisons			
Comparison to Veterans getting community care not paid by VA			

ES Figure 2. Evidence Map of Studies on the Quality of Surgical Care

VA care is better for all or most outcomes	 21 Non-cardiac perioperative mortality⁶⁷ 21 NSCLC mortality, overall median survival, readmission rate⁷⁴ 21 Perioperative complications, mortality³⁶ 24 Outcomes of women undergoing noncardiac surgery⁶⁸ 20 Surgical patient safety indicators, mortality 2020⁷² 24 Post-operative opioid prescribing⁶ 	21 Carpal tu time to si	uedic specialty vait times ⁴⁸ nnel syndrome sho urgery ⁷⁰	rter
VA Care and Community are about equal or mixed results	complications ⁷⁵ for	5 21 Cat trav 66 <mark>'18</mark> Ele tra		
Community care is better for all or most outcomes	 Hip fracture repair 30 day and 1 survival, admit to surgery time⁶¹ Total hip and knee arthroplasty perioperative complications, read Quality/Safety 	mission rate ⁵⁹ (18) Kidney travel d	transplant rate, istance ¹⁵ to t surgery ⁶⁹ Patient Experience	 *18 Elective coronary revascularization costs²⁵ *21 Cost of orthopedic procedure⁷³ *21 NSCLC length of stay⁷⁴ Cost and length of stay for CABG²⁸ Joint replacement length of stay⁵⁹ Cost/Efficiency
Comparison to Veterans getting VA-paid care in the community Comparison to the general population getting non-VA care Comparison to Veterans getting community care not paid by VA				

The large majority of studies assessed quality and safety, followed by comparisons of access to care. Few studies assessed patient experience or cost/efficiency. We found 1 study comparing VA to non-VA care on equity. Most studies found that the quality and safety of VA care is as good as, or better than, care in the community. This was the case for both surgical care and non-surgical care, and for community care of Veterans and community care of non-Veterans. For the domains of access and of cost/efficiency, findings were more mixed and about the same number of studies found that VA care is better, VA and community care are about the same, or that community care is better. The few studies of patient experience found that VA care and community care were about the same, or VA care was better. We did not identify any study the found that patient experience was better in community care. With only 1 exception in both the surgical and the non-surgical studies, VA-delivered care was as good as or better than Veterans received from VA-paid community care. We did not identify any studies comparing care for some conditions for which the MISSION act has resulted in increased community care, such as Physical Medicine and Rehabilitation.

NEW EVIDENCE SINCE MAY 2024

This report updates an earlier review, which included evidence available through May 2024. Six additional studies published through October 2024 were included in this update. One of the studies was specific to surgical care, and the other 5 studies were about care in general or non-surgical care.

The first of the new studies compared the Centers for Medicare & Medicaid Services (CMS) Overall Hospital Quality Star Rating for 2023 between 136 VA hospitals and 4,518 non-VA hospitals, and then also performed a second analysis between 112 VA hospitals and 112 non-VA hospitals matched for geographic location, and measure reporting profile.¹ The Overall Star Rating includes measures of death from a number of medical conditions (acute myocardial infarction, heart failure, pneumonia, *etc*) 30-day readmission rates for a number of conditions, measures of hospital-acquired infections, complications from hip and knee replacement surgery, a composite of patient safety measures, 8 measures from the Hospital Consumer Assessment of Healthcare Providers and Systems patient survey, and then a number of measures labeled as Timely and Effective Care, which includes health care provider vaccination status, time spent in the emergency department (ED) and disposition, prompt evaluation of patients with stroke symptoms, screening colonoscopy follow-up intervals, and appropriate care for severe sepsis. VA hospitals were more likely than non-VA hospitals to receive 4- and 5-star ratings and less likely to receive 2- and 3-star ratings. The matched analysis showed similar results.

In the second study, investigators used Corporate Data Warehouse (CDW) data to compare diabetes care among 652,648 patients receiving primary care in VA and 3,650 patients receiving VA-paid primary care in the community in 2020–2022. Analyses were adjusted for a number of covariates, including age, gender, Charlson score, and baseline hemoglobin A1c value.² Veterans receiving primary care at VA were more likely to have received recommended care such as a Hemoglobin A1c test, an eye exam, and a microalbumin urine test. Veterans receiving primary care at VA were also more likely to have received an influenza vaccine, to have fewer primary care visits. and to have a slightly lower probability of any hospitalization. There was no difference between groups in the rates of ambulatory care sensitive condition hospitalizations.

The third study used CDW information to assess changes in Veteran hospitalization and readmissions/ED visits during the time of the MISSION Act implementation.³ Between 2016 and 2021 and encompassing 1,735,917 total patients, investigators found that VA-paid community care

hospitalizations increased while VA hospitalizations decreased (as did Veterans' hospitalizations in non-VA hospitals paid for by Medicare.) Compared to Veterans who were cared for at VA hospitals, early in the study period Veterans cared for as part of community care had a 47% increased risk of 7-day readmission and a 20% increased risk of 30-day readmission; this persisted at a similar rate to end of the study period (37% increased risk of 7-day and 19% increased risk of 30-day readmission). Conversely, ED visits were initially higher for community care-treated Veterans but then decreased such that by the end of the study there were fewer ED visits in community care patients compared to VA-treated patients.

The fourth study compared patient experience and patient safety indicators across a nationwide sample of 133 VA hospitals and 1116 academic non-VA hospitals.⁴ The investigators used 2018 data from the CDW, the Hospital Consumer Assessment of Healthcare Providers and Systems, and the Strategic Analytics for Improvement and Learning. Compared to non-VA hospitals, VA hospitals had slightly but statistically significantly better overall hospital ratings (88.3 vs 87.7, p = 0.04) and lower (better) patient safety scores (0.88 vs 1.03, p = 0.0002).

The fifth study was a survey of Veterans receiving acupuncture or chiropractic care from VA providers or VA-paid care in the community.⁵ Among 201 patients receiving acupuncture (109 VA, 92 community care) and 178 patients receiving chiropractic care (110 VA, 68 community care), there were no statistically significant differences in patient self-report of pain and function at 6 months.

The 1 new study about surgical care concerned cochlear implantation.⁶ Investigators identified 83 Veterans who received a cochlear implant at a single VA center between 2008 and 2019 and matched these to 83 patients contained in a national multicenter database of patient demographics and outcomes following cochlear implantation. Patients were matched on sex, age, and baseline level of hearing function using the consonant-nucleus-consonant score. After implantation, both groups had improvements in hearing, and there were no statistically significant differences between groups in measures of hearing at 3, 6, and 12 months.

CONCLUSIONS

In general, most published studies of comparisons of quality of care show that Veterans getting care from VA get the same or better quality care than Veterans getting community care or the general public getting non-VA care. The most recently available evidence, published between May 2024 and October 2024, continues to support this conclusion.