WHITEPAPER

ED Optimization: Avoid Unnecessary Utilization, Reduce Costs, and Transform Patient Care

Annual emergency department (ED) visits in the US reached 145.6 million in 2016, a 20 percent increase in just ten years.[1] The ED has become the front door to the wider health system for many individuals, leading to overcrowding, boarding, and long wait times—all of which can harm patient care and create risk for providers.

By addressing utilization rates and optimizing workflows, emergency departments can increase throughput, improve efficiency, and avoid preventable visits and admissions—ultimately saving on care costs and increasing revenue—while providing better quality care.

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ED Visit Rates Are Rising: 3 Reasons Why

Emergency departments have become a critical source of care for vulnerable patients and "safety-net" populations, individuals without access to appropriate care, and uninsured or underinsured patients. Additionally, EDs often serve as diagnostic centers because of access to resources, including advanced technology.

1) Primary Care for Safety-Net Populations

EDs serve as a critical source of care for patients that often have nowhere else to go for care, including those affected by social determinants of health, substance use disorders, and mental or behavioral health conditions. This also includes individuals who are uninsured or rely on Medicaid, especially as Medicaid coverage has been linked to an approximate 40 percent increase in ED use.[2]

The lack of available mental and behavioral care providers fuels ED utilization by at-risk populations. Emergency department visits related to substance use disorder or mental health increased by over 44 percent from 2006 to 2014, with those related to suicidal ideation increasing by nearly 415 percent.[4]

Additionally, studies show that EDs in rural areas are increasingly serving safety-net populations. A cross-sectional study reported that rural emergency departments are experiencing a 50 percent increase in visits, significantly more than their urban counterparts.[3] They are serving disadvantaged groups and are becoming increasingly classified as safety-net hospitals, with the number of rural EDs classified as safety nets increasing by nearly 27 percent between 2005 and 2016, according to the cross-sectional study above. This uptick in rural ED visits may also be due to a lack of appropriate or timely care in rural areas.

What Is a Safety-Net ED?

The Centers for Disease Control and Prevention (CDC) defines a safety-net ED as having more than 30 percent of visits with Medicaid as the expected payment source, more than 30 percent of visits with self-pay or no charge as the expected source of payment, or having a combined number of Medicaid and uninsured visits greater than 40 percent.[3]

2) Lack of Access to Non-Urgent Care

Studies show that 30 percent or more of all US emergency department visits are not urgent.[5] One study found that 22 percent of patients with non-urgent ED visits had tried, but failed, to access primary care first.[6] In the same study, nearly half of patients who described the ED as their usual source of care had unsuccessfully tried to obtain an appointment with a primary care provider (PCP). This is likely because over a quarter of primary physicians were not accepting new Medicaid patients, and more than one-fifth were not accepting new patients without insurance. Additionally, a CDC survey showed that about 80 percent of adults who visited an ED did so because they lacked access to other providers.[7]

Those who do try to seek primary care may end up in the ED anyway for a variety of reasons, according to a RAND report.[7] These reasons include:

- Not being able to get in contact with a PCP
- Unable to book a timely appointment
- Being uninsured, or having insurance the PCP doesn't accept

3) EDs as Diagnostic Centers

Even those who do obtain primary care may find themselves sitting in an emergency department. A 2018 study shows that around 25 percent of US adults with one or more ED visits in the last 12 months were referred to the ED by an outpatient provider.[8]

Emergency departments have access to advanced technology, like CAT scans and MRIs, as well as resources such as specialists. Primary care providers recognize that emergency departments can facilitate evaluations, observations, complex workups, and expedite non-elective admissions—all of which cannot occur in busy clinics where providers are seeing patients every 15 minutes and have limited resources.[7] However, when emergency providers don't have access to a patient's health records, they may end up ordering diagnostic tests that have already been done. This leads to congested emergency departments as physicians and nurses struggle to take care of patients in a timely manner.

Avoidable ED Utilization Harms Patient Care: What to Do About It

Increasing numbers of patients in emergency departments create patient flow problems that have been linked to adverse health outcomes.[9] These patient flow issues include:

- Boarding[10]
- Long wait times that have even lead to death[11]
- Increased length of stay and left without being seen (LWBS) rates[12]
- Overcrowding, which has been linked with violence towards ED staff members[13]

ED clinicians are decision makers for more than 50 percent of all US hospital admissions, meaning they have the greatest opportunity to prevent potentially avoidable admissions and readmissions.[7] Additionally, 1 in 31 hospital patients has at least one healthcare-associated infection. Reducing preventable hospital admissions can help patients avoid contracting infections or illnesses.[14]

The following are seven success stories discussing ED optimization strategies that have shown real results for providers across the nation. These hospitals, medical centers, and programs have not only reduced ED utilization, but have also impacted other focus areas such as workplace violence, behavioral health, readmissions, transitions of care, substance use disorder, and 911 services.

Success Story: ER is for Emergencies

In 2012, the "ER is for Emergencies" program began through a collaborative effort between the Washington State American College of Emergency Physicians, the Washington State Medical Association, and the Washington State Hospital Association due to concerns about the costs associated with frequent ED use.

ER is for Emergencies Outcomes

With Collective's ADT notification based platform, the ER for Emergencies program has been able to break down barriers between providers and streamline collaboration. In the first year, Medicaid ED costs in Washington state decreased by nearly $34 million, due to a reduction in the following:[16]

- *9.9% reduction* in overall ED Medicaid visits
- *10.7% reduction* in ED visits among frequent utilizers
- *14.2% reduction* in low-acuity ED visits
- *24% reduction* in narcotic prescriptions from the ED

This program is aimed at redirecting care to more appropriate settings, improving overutilization, and reducing preventable Medicaid ED visits through seven best practices:[15]

1. Adopt an electronic emergency department information system
2. Implement patient education efforts
3. Identify patients with frequent utilization patterns
4. Develop care plans for those with frequent utilization patterns
5. Implement narcotic guidelines
6. Track patients being prescribed controlled substances by enrolling in the state's Prescription Monitoring Program (PMP)
7. Review reports and ensure interventions are working

Success Story: Sturdy Memorial Hospital

Sturdy Memorial Hospital is a small, independent hospital in Southeast Massachusetts. Being the only hospital in the region, and not having affiliations to other hospitals, makes finding beds and funding a challenge—especially for behavioral health patients.

Sturdy Memorial turned to Collective to gain insights on behavioral health patients who were utilizing the ED. Staff qualified behavioral health patients with the highest utilization patterns into outpatient programs with dedicated case managers. In the case of an ED visit, ADT-based notifications automatically alerted ED physicians and staff of patient and case manager information, allowing the ED physician to involve the case manager in treatment and post-

Sturdy Memorial Hospital Outcomes

By involving case managers in the care of behavioral health patients, Sturdy Memorial has seen a *78 percent decrease in ED utilization* by enrolled behavioral health patients during an initial pilot.[17]

Success Story: Legacy Salmon Creek Medical Center

"Because the ED is the point of entry for hospital admissions, readmissions, and emergency care, we needed to realize the forces behind ED traffic and use it as the center for decreasing readmissions," says Cynthia Miceli, RN, BSN, CCM, and ED RN Case Manager at Legacy Salmon Creek Medical Center, a hospital in Southwest Washington.

Legacy Salmon Creek designed an emergency department readmissions algorithm around the Collective platform. This algorithm standardized the assessment of patient needs and consideration of alternatives to readmission, giving providers needed access to relevant patient insights for more informed care decisions.

Legacy Salmon Creek Medical Center Outcomes

Legacy Salmon Creek has been able to *reduce the overall ED visit rate by 81 percent*, which led to a nearly 25 percent reduction in all-cause 30-day readmissions and earned the hospital an Award of Excellence in Healthcare Quality by Qualis Health in 2018.

Success Story: CHI St. Anthony Hospital

In 2015, CHI St. Anthony Hospital estimated that up to 50 percent of the ED's average daily patient load was more appropriate for a lower-acuity care setting. Something needed to be done to help the small critical access hospital in rural Oregon balance patient care initiatives with limited resources.

Using Collective's platform, CHI St. Anthony started identifying patients better suited for primary care and those at risk for substance use disorders. In doing so, staff members have been able to coordinate and collaborate patient care for those patients with other hospitals and clinics across the community.

CHI St. Anthony Hospital Outcomes

Within 18 months, CHI St. Anthony saw a *75 percent decrease in unnecessary ED visits*, ultimately improving patient care and lowering costs.[19]

Success Story: Torrance Memorial Medical Center

Providers at Torrance Memorial Medical Center in Southern California needed to find a way to better care for patients walking through hospital doors, particularly those with complex needs, substance use disorder, or a history of violence.

An interdisciplinary team of case managers, social workers, nurses, and physicians started meeting to discuss the needs of vulnerable patients who were frequently utilizating the ED. They created unified care plans that were then stored within Collective's platform so providers could access insights via real-time, ADT-based notifications wherever the patient went.

Torrance Memorial Medical Center Outcomes

Focusing on collaborative care plans has not only led to preliminary results showing a *57 percent decrease in ED utilization*, but has also helped Torrance Memorial address workplace violence.[20]

Success Story: The Portland Clinic

ED optimization isn't just confined to the efforts of hospitals. Collaborating with other facilities can improve emergency department metrics and workflows. This is the case for The Portland Clinic—a clinic in Portland-area Oregon offering over 30 areas of practice within primary care, specialty care, and a range of health services.

When The Portland Clinic and its six locations began participating in value-based payer arrangements, staff started looking for ways to improve care transitions, prevent unnecessary readmissions, and optimize patient care.

Collective's platform notified providers when patients were admitted to the ED, allowing them to quickly follow up and support patients in need. The Portland Clinic implemented a transitions of care plan and overhauled their Transitional Care Management (TCM) workflows.

The Portland Clinic Outcomes

The Portland Clinic has realized a *13 reduction in ED visits for pilot patients with high utilization patterns* and a 30 percent increase in revenue due to a 33 percent increase in TCM codes.[21]

Success Story: Northwest Physicians Network

Northwest Physicians Network (NPN) is an independent physician association serving Pierce County in Washington State. In 2015, it set out to lower the over-utilization of the region's emergency services—including 911, EMS transport, and the emergency department.

Quickly, NPN realized that many of the people inappropriately using emergency services suffered from substance use disorder or mental health conditions. NPN, along with other local organizations, started connecting patients with care managers as soon as they called 911, helping hundreds of patients receive better and more timely care.

Northwest Physicians Network Outcomes

Since implementing comprehensive care using Collective's platform, Northwest Physicians Network has seen a nearly *50 percent reduction in ED utilization.*[22]

About Collective Medical

Collective Medical provides the nation's largest and most effective ADT-based network for care collaboration. Our risk-adjusted event notification and care collaboration platform spans across all points of care—including emergency departments, hospitals, payers, behavioral and physical ambulatory, and post-acute settings. This technology integrates seamlessly with existing workflows and allows providers to identify and support at-risk patients in real time—avoiding preventable admissions and utilization and providing better care.

Learn more at collectivemedical.com

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