



COVENANT MEDICAL STAFF NEWSLETTER | SEPTEMBER 2019



Strategies To Avoid Burnout

GUEST AUTHOR & FORMER CHIEF OF STAFF
Dr. Sarosh Anwar

According to our latest Physician and NP/PA Engagement Survey (see related article on page 6), about 25% of physicians who presently work at Covenant HealthCare have experienced burnout in the past year. This obviously impacts the quality of life for these physicians and can adversely affect the care of their patients.

A few years ago, Dr. Mark Greenwell and I conducted a half-day workshop for physicians and mid-level providers on how to avoid burnout. The following are just a few thoughts from that workshop.

- Always look at people who have a worse deal than you. I had to work 36 hours nonstop
 every fourth day in my internship year. However, the general surgery and obstetrics and
 gynecology interns had to work 36 hours every third day. Looking at them made my heavy
 workload feel not as bad!
- Try to learn from all experiences. At times, you will have someone in a position of authority
 over you who will be very difficult to deal with. I have tried to learn from those people,
 absorbing knowledge to make me a better doctor while also learning what not to do in my
 own life.
- Count your blessings and try to find silver linings, even on a bad day. Our attitude is the biggest determinant of how content we are in life. We cannot always change the cards we are dealt, but we can choose how to react to them. I get a migraine occasionally and when it resolves, just not having a migraine and feeling back to normal feels so good.
- Life is too short to jump up and down over adverse situations. Being able to forgive others and move on in our lives as quickly as possible makes a huge impact on our quality of life and avoiding burnout.
- Give yourself a break, mentally and physically. Carve out time for yourself and family, and focus on a healthy diet, exercise and social outlets. This can only make you a better physician and person.

One piece of advice I frequently give medical students and residents is to choose a specialty or sub-speciality based on what they think they will enjoy, not because it is very competitive or earns a higher income. I am blessed that I enjoy patient interaction and am on a "high" at the end of my clinic days. I wish the same type of "high" for all of you.

Above all, be true and kind to yourself, your families and patients. Joy and contentment will follow.

"It has been a privilege serving as your Chief of Staff and I wish the best of luck to Dr. Kathleen Cowling as she takes over this role."

Sincerely

Sarash Anwar

Medical Staff Leadership Changes

We'd like to call attention to a few Medical Staff Leadership changes that occurred in July.

- Given Dr. Sarosh Anwar's decision to accept employment by Ascension St. Mary's Hospital, he has resigned from his role as Chief of Staff of the Covenant HealthCare Medical Staff. We extend our thanks and appreciation to Dr. Anwar for his service as a Medical Staff officer.
- In accordance with our Medical Staff Bylaws, Dr. Kathleen Cowling, our Vice Chief of Staff, assumed the role of Chief of Staff through December 31, 2020. Dr. Sanjay Talati, our Secretary/Treasurer, assumed the role of Vice Chief of Staff also through December 31, 2020.
- We are working with members of the Medical Executive Committee and the Nominating Committee to identify a candidate to fill the vacant Secretary/Treasurer position.

Please join us in thanking Dr. Anwar for his service, and in offering support to Drs. Cowling and Talati as they assume their new roles.



Dr. Kathleen Cowling Chief of Staff



Dr. Sanjay Talati Vice Chief of Staff

CONTENTS

Brainlab and ExacTrac® Raise Targeted Radiation To New Heights	2
CODE STROKE and Mechanical Thrombectomy: What You Need to Know	3
Urinary Bacteria: To Treat or NOT To Treat	4
Diagnosing Colorectal Cancer at Younger Ages	5
2019 Engagement Survey Delivers Positive Results	& 7
The Chart Spotlights / Physicians of the Month	8



Brainlab and ExacTrac® Raise Targeted Radiation To New Heights

GUEST AUTHOR

Dr. James Fugazzi, Radiation Oncologist, Covenant Radiation Center

A recent expansion at the Covenant Radiation Center features a second, state-of-the-art Elekta Versa HD[™] linear accelerator (LINAC). Versa HD is the latest generation of high-tech machinery and the newest in the state. Both LINACS include a built-in cone-beam CT scanner, allowing better positioning and daily image-guided radiation therapy.

Having a second LINAC allows more patients to be accommodated each day, and adds more convenient treatment times to the schedule. Importantly, this new unit has been outfitted with Brainlab Elements software and ExacTrac® technology, allowing radiation oncologists to deliver extremely precise, stereotactic ablative radiotherapy (SBRT) and stereotactic radiosurgery (SRS) to patients – especially those having hard-to-reach tumors.

Technologies 101

Covenant HealthCare is the first cloud-based Brainlab and ExacTrac system to be utilized in the United States, enabling physicians to securely and easily access all patient images and data from any location or device. This helps improve the efficiency, effectiveness and quality of interventional solutions. Below is an overview of the Brainlab and ExacTrac technologies, along with a refresher on SBRT and SBS procedures:

- **Brainlab:** This is a revolutionary software program that allows radiation oncologists to quickly treat multiple small brain lesions simultaneously (something that was not possible up until this software). It represents an important step in helping many patients avoid potentially toxic whole-brain radiation. Importantly, patients can receive their treatment in a matter of 15-20 minutes as opposed to 60-90 minutes. For SRS treatments, patients will also appreciate the use of a frameless, painless and non-invasive positioning system that allows them to be positioned only once for multiple lesions.
- ExacTrac: This is an advanced form of imaging incorporated into the treatment room and LINAC. It uses quality diagnostic X-rays and digital, flat panels for real-time imaging of patients and patient motion. This improves the accuracy and position of patients before and during their treatment.
- **SBRT:** This offers many patients who have Stage I lung cancer (with limited pulmonary reserve) the opportunity to undergo a curative, non-invasive treatment with very high (>90%) local control rates. Patients will benefit greatly from this technology in terms of convenience as SBRT treatments are typically only one to five treatment sessions (fractions).
- SRS: This allows radiation oncologists to deliver extremely high doses of conformal radiation to very small, often-inaccessible body parts such as the brain, spine and liver. Such high doses of radiation have increased tumor control rates and thus improved outcomes and survival. This technology is the gold standard in radiation oncology. Avoiding whole-brain radiation is critical to decreasing a patient's potential for cognitive and memory loss.



More Innovation News

As part of its extensive renovation, the Covenant Radiation Center has also:

- Added office space, a separate ambulance entrance, changing rooms and waiting rooms along with a staff lunchroom and lockers. Renovations to existing space include a new nursing station, front desk area, waiting area with resource center and updated examination rooms.
- Installed a new, wide-bore, multi-slice GE Discovery CT scanner with increased capabilities, including 4D-motion management and enhanced imaging quality with artifact reduction software. 4D-motion management allows tumor movement to be tracked and accommodated during the radiation planning and delivery process.
- Upgraded its standard treatment planning system, RayStation, to the latest version. RayStation utilizes the most sophisticated planning software to allow highly complex radiation plans, including 3D conformal, intensitymodulated radiation therapy and volumetric-modulated radiation therapy.

For more information, contact Dr. Fugazzi at 989.583.5250 or james.fugazzi@chs-mi.com.



CODE STROKE and Mechanical Thrombectomy: What You Need to Know

GUEST AUTHOR

Dr. Kirsten Guenther, Emergency Medicine, Covenant HealthCare

A grandfather climbing the bleachers to watch his grandson's baseball game, a young woman saddling her horse for a ride, and a new mom lifting her daughter from the crib to console her cries: What do these people have in common? They all had strokes. Fortunately, they got help right away, are back doing what they love, and in their darkest hour put their lives in the hands of Covenant HealthCare caregivers.

Stroke is the fifth leading cause of death and the leading cause of disability in the United States. The monetary cost exceeds \$100 billion annually, but the real cost is borne by the families who lose loved ones, and by survivors who lose functionally independent lives.

Mechanical Thrombectomy: A New Standard

Research shows that each 10-minute delay to definitive treatment costs patients an average of 39 days of disability-free life. Despite this, treatment of acute ischemic stroke (AIS) has seen few advances.

In 1995, tissue-type plasminogen activator (tPA) was introduced, but tPA only helps patients treated within 4.5 hours of symptom onset. More recently, mechanical thrombectomy (MT) changed the face of acute stroke care, extending the treatment window to 24 hours. In 2018, the DAWN and DEFUSE trials showed the efficacy of MT in patients with large vessel occlusion (LVO) who presented up to 24 hours after stroke onset, and MT became the standard of care when the American Stroke Association listed it as a **Class I recommendation** in the 2018 Guidelines for the Early Management of Patients with Acute Ischemic Stroke.

CODE STROKE: The New Protocol

To help physicians more efficiently evaluate and treat patients with AIS, Covenant is expanding its stroke resources. Through a cooperative effort between neurologists, emergency physicians, radiologists, and nursing leadership, Covenant developed the CODE STROKE Activation and Response process, including the Code Stroke Treatment and Imaging Protocol, to help physicians select the most appropriate tests and treatment options. The policy and protocol are available on CovNet and in stroke binders. The binders can be found in the Emergency Care Center, in CT control rooms and on all code carts.

Whenever a patient presents with stroke-like symptoms that began within the past 24 hours, a nurse or a physician should activate a CODE STROKE. Once activated, providers must:

- Follow the CODE STROKE Treatment and Imaging Protocol. To navigate the protocol, simply determine when the symptoms began and if the symptoms are consistent with an LVO stroke.
- Obtain a stat non-contrast head CT and call the radiologist immediately to discuss results.
- If the patient is eligible, offer treatment with tPA. Note that

tPA can be given if, within 4.5 hours of onset, no exclusion criteria are met, and if CT shows no evidence of bleeding, subacute stroke or alternate causes for the symptoms.

- Once tPA is given or if the patient is not a candidate for tPA—order a stat CT angiogram (CTA) of the head and neck. If an LVO is identified, contact a comprehensive Stroke Center to discuss transfer.
- If more than six hours from onset, order a CT perfusion (CTP) to measure the size of the ischemic penumbra, which helps determine if MT could be beneficial.

Please see the sidebar below for additional critical actions as defined by Healthcare Facilities Accredition Program (HFAP).

Remember that strokes are not limited to the elderly and the sooner you treat patients, the better their quality of life will be. Covenant was recently granted the highest award by the American Stroke Association for providing outstanding stroke care—the ONLY hospital in the region to earn this honor. To further improve care at Covenant, leadership is working toward offering MT as an inhouse treatment option.

For more information, contact Melissa Duchene, Stroke Coordinator, at 989.583.6685 (mduchene@chs-mi.com) or Dr. Guenther at 989.583.7137 (kguenther@chs-mi.com).

HFAP Standards

In addition to complying with American Stroke Association standards, HFAP-certified Primary Stroke Centers like Covenant must also meet the following HFAP standards:

- Administer tPA to eligible patients within 30 minutes of arrival.
- Stroke team member must evaluate patient within 15 minutes of CODE STROKE activation.
- Obtain glucose result within 45 minutes.
- Obtain non-contrast head CT and result within 35 minutes.
- Ensure neurosurgical services are available within two hours to manage complications of hemorrhagic stroke.
- Complete dysphagia screen prior to giving patient anything by mouth.
- Initiate venous thromboembolism (VTE) prophylaxis.
- Initiate anticoagulation therapy for patients with atrial fibrillation/flutter.
- Initiate antithrombotic therapy by the end of hospital day two.
- Assess need for rehabilitation.
- Provide stroke education during hospitalization.
- Discharge on antithrombotic therapy.
- Discharge on statin medication (unless LDL<70 mg/dl).



Urinary Bacteria: To Treat or NOT To Treat

GUEST AUTHOR Dr. Nicholas Haddad, Infectious Disease, CMU Health

"I guess I have a UTI. My doctor says I do, but I do not feel anything wrong with my urine."

- PATIENT REMARK

That statement is worth thinking about twice. Urinary tract infections (UTIs) are among the most common infections in the United States, yet one of the few instances where diagnosis should be driven by clinical symptoms. It is only a UTI when the patient feels it; only then should tests be ordered.

Overdiagnosis and Overtreatment

UTIs are often overdiagnosed, leading to the extravagant use of antimicrobials without indications, but with risks – such as antimicrobial resistance and side effects. Furthermore:

- The CDC reports that nearly 40% of all antibiotics prescribed for presumed UTI could have been avoided.
- Inappropriate antibiotic utilization increases healthcare costs for patients and the government alike.

UTI is not a laboratory-defined diagnosis. Rather, it is a diagnosis based on clinical symptoms whenever possible and confirmed by positive urine microscopy and culture. Even then, not much attention should be paid to the CFU number (colony count) as other factors could be impacting it.

- In symptomatic men and women, a >102 cfu/mL are usually clinically meaningful.
- In asymptomatic bacteriuria (ASB) patients, a 10⁵ growth and pyuria have no clinical significance unless the patient is pregnant and/or undergoing a transurethral urologic procedure.
- Many factors can affect urine appearance, odor, and presence of pyuria and bacteria, including dehydration, specimen contamination, sexually-transmitted infections, vaginitis, urethritis and cystitis.
- Positive leukocyte esterase, low WBC counts, positive nitrates, yeast/candida or altered mental status alone are not enough to prescribe antimicrobials.
- The presence of bacteriuria does not mean there would be progression to UTI; the urinary microbiome can actually have a "protective" benefit.

Evidence Against Antimicrobials

Most pathogens are enteric gram-negatives. They migrate from the gastrointestinal tract via periurethral colonization. This process is normally combated by normal flora, but if the

flora are dead (e.g., due to antibiotic use), then periurethral colonization by GI pathogens occur, leading to uroepithelial colonization – or ASB. Hence, the relationship with antibiotics is a complex and self-perpetuating vicious cycle. They predispose to ASB, yet ASB can reflexively lead to more antibiotic use – and that is why caution is required.

Evidence-based guidelines recommend no antimicrobial therapy for almost all ASB patients due to lack of benefit. This applies to people living in nursing homes; spinal cord injury patients; catheterized patients; diabetics; premenopausal women; and people having low-risk neutropenia. Of note:

- In young women with ASB and recurrent symptomatic UTI, recent evidence suggests that in the antibiotic treatment group, women were more likely to have symptomatic UTI over one year of follow-up, more recurrence and multi-drug resistant organisms in 27 months of follow-up, and a poorer quality of life. Hence, ASB may indeed play a protective role in preventing symptomatic recurrence.
- Prevalence of bacteriuria discovered in nursing home residents who are doing well ranges between 15-50%, hence the importance of ordering tests only when the pre-test probability of a UTI is high. Screening for ASB may lead to mislabeling patients as having UTI, and subsequently drive the use of unindicated therapy. Most episodes of fever, chills or confusion in an elderly patient with a positive culture but no symptoms are NOT due to UTI.

There are diagnostic challenges in patients without sensation or comatose, intubated or otherwise uncommunicative states. When in doubt, don't hesitate to treat until the clinical picture gets clearer.

Practical Advice

Together, we can avoid overtreatment and overdiagnosis of UTIs as follows:

- Recognize the presence of a healthy urinary microbiome.
- Use antimicrobials mindfully, avoiding their use in ASB patients.
- Call the situation "colonization" or "urinary tract dysbiosis" rather than UTI, as the word "infection" triggers concerns and suggests prescribing antimicrobials.
- Remind patients with recurrent UTI to self-hydrate adequately, urinate at regular intervals and after intercourse, and maintain hygiene especially prior to intercourse. For women, intravaginal probiotics may also help.
- Read this additional online reference dispelling some myths and outlining evidence-based recommendations: Top Ten Myths Regarding the Diagnosis and Treatment of Urinary Tract Infections.

For more information, contact Dr. Haddad at 989.746.7681 (hadda1ne@cmich.edu).



Diagnosing Colorectal Cancer at Younger Ages

GUEST AUTHOR
Dr. Jorge Reguero Hernandez, Colorectal Surgeon, Covenant Medical Group Surgery

Colon and rectal cancers are growing at an alarming rate among young adults in the United States. This is a pattern that has attracted the attention of major medical organizations across the country and is reaching alarming proportions – to the level of becoming a public health issue.

- According to the American Cancer Society (ACS), a recent study using data from the Surveillance, Epidemiology and End Results program shows colon cancer incidence rates steadily increased by 1-2% per year since 1974 through 2013 for adults ages 20-39. Rectal cancer incidence rates have been increasing even longer and faster than colon cancer
- Overall, a 22% increase in colorectal cancer incidence in patients younger than age 50 is estimated since 2000, with a 13% increase in cancer death rates in this age group. This increase occurs as the rate at which new colon and rectal cancer cases diagnosed in patients older than 50 has been dropping since the mid-1980s, in large part due to widespread screening.

Causes

It is not entirely clear why there is an uptick in colorectal cancers in the younger population. Possible culprits include the rising incidence of obesity and poor dietary habits, the consumption of red meats, alcohol and processed foods, smoking and sedentary behavior. High blood sugar and vitamin D deficiency may also be associated with the disease.

More recently, the relationship with changes in the microbiome or bacterial composition of the colon is under intense scrutiny. A lesser role is played by known or unrecognized hereditary syndromes.

Diagnosis

Colorectal cancer should be considered in any patient younger than age 50 who presents with the most common signs and symptoms. These include a change in bowel habits, such as diarrhea, constipation or narrowing of the stool lasting more than a few days; rectal bleeding or blood mixed with the stools; unintended weight loss; weakness and fatigue.

It is well known that younger patients tend to seek medical attention later, usually after they have had symptoms for at least six months. However, a recent survey made by the Colorectal Cancer Alliance of young colorectal cancer survivors indicates 82% were initially misdiagnosed and 50% felt their symptoms were ignored by physicians.

The main cause for misdiagnosis was related to the presence and treatment of hemorrhoids. It is important to maintain a high degree of suspicion and consider more proximal pathologies despite the presence of hemorrhoids. At present, screening guidelines endorsed by organizations like the ACS recommend colonoscopies starting at age 45 years rather

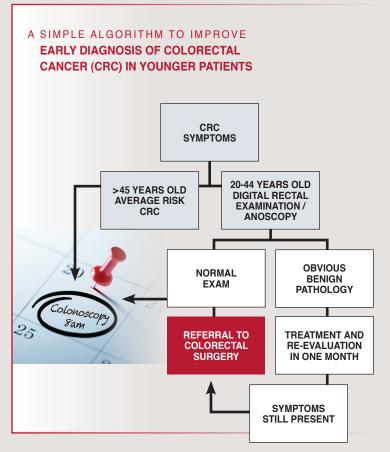
than 50 for those patients at average risk (no family history). However, no direct evidence supports that patients younger than 50 will derive the same benefits from screening, and this has not allowed justification for large-scale policy change.

Staying Alert

Educational campaigns are needed to alert clinicians and the general public about the increase in colorectal cancer among young people. This will not only help reduce the delays in diagnosis prevalent in this population, but can also serve to encourage healthier eating and more active lifestyles to try to reverse this trend.

The adoption of algorithms like the one proposed below is very useful in improving early diagnosis and treatment success. Physicians should proactively ask questions about rectal health even in their younger patients. If the patient identifies symptoms, the physicians should perform a simple rectal exam to determine any suspicious mass or bleeding. If this is discovered, the physician should refer the patient for a colonoscopy.

For more information, contact Dr. Hernandez at 989.790.4855 (jorge.reguero-hernandez@chs-mi.com).







2019 Engagement Survey Delivers Positive Results

Dr. Michael Sullivan, Chief Medical Officer, Covenant HealthCare and Karen Bedford, Director of Physician Relations & Regional Outreach, Covenant HealthCare

The results for the 2019 Physician, Nurse Practitioner and Physician Assistant (NP/PA) Engagement Survey for Covenant HealthCare are in. Although the response rate declined from 52.8% in 2017 to 40.4%, the findings are still positive.

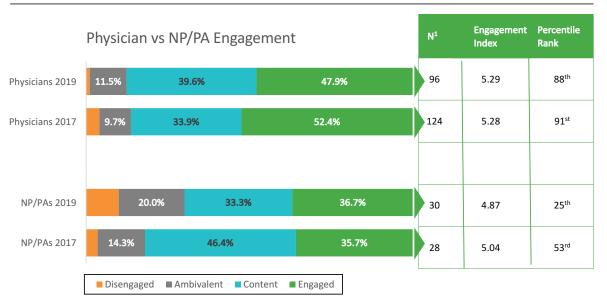
Survey Context

- Two survey paths were pursued:
 - 1) Physicians and NP/PAs employed by Covenant and
 - 2) Those who practice at Covenant but are not employed by Covenant Medical Group (CMG).
- Level of **Engagement** was measured for the Covenantemployed group. Ranking choices run from being highly engaged and loyal to being content, ambivalent or disengaged.
- · Level of Alignment was measured for all non-CMG employed participants. Ranking choices run from being highly aligned with a strong commitment to admit/refer patients, to being loyal, at risk (lower loyalty) or disaffected.
- Burnout questions were asked for the first time in the survey and will help us better measure and address it in the future.

Key Findings

- Our gap to benchmark on most survey items is very positive - double-digit above the benchmark.
- Covenant-employed physician engagement decreased from 2017, but still ranks in the top quartile with more physicians feeling engaged. Conversely, Covenant-employed NP/PAs felt de-prioritized, showing more ambivalence and disengagement, ranking in the bottom quartile. See Figure 1 below.
- Non-CMG employed participants are still showing strong alignment, with both groups – physicians and NP/PAs – in the top quartile. See Figure 2 on page 7.
- There is a clear gap between physicians and NP/PAs in terms of percent aligned and engaged, with NP/PAs falling short of the desired target. See Figure 3.
- All groups shared the belief that a key strength for Covenant is its pursuit of an effective EMR/EHR strategy.
- Physicians indicated that disruptive behavior remains a concern, although less of one due to programs that address the issue. They also listed burnout as a chief concern.

FIGURE 1 **Covenant-Employed Physician Engagement Holds Steady;** NP/PAs More Disengaged and Ambivalent



^{1.} N represents the number of respondents who have not indicated that they are planning to move, retire, or go back to school full time in the next three years 2. Benchmarks applied: Employed through a contract; MD or DO, DDS or DMD 3. Benchmarks applied: Employed through a contract; PA, NP or other advanced practice nurse

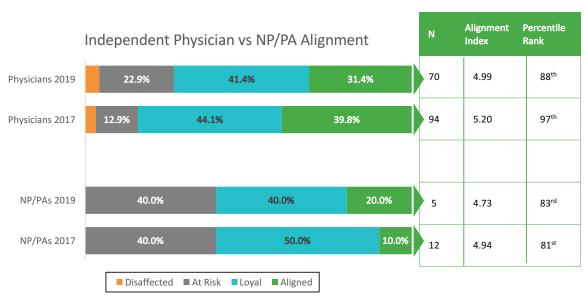
Action Plan

Based on the survey results and open-ended feedback, leadership is continuing to take action to improve the culture at Covenant. Key areas of focus include reducing disruptive behavior, making Epic improvements, addressing burnout and increasing our engagement with NP/PAs. See Table 1 for details.

Providers can expect to see initiatives to address these areas of concern, further driving extraordinary care at Covenant. Please remember to participate in the next survey in 2020 as your input is critical in helping us target resources that make a difference.

For more information about survey results contact Karen Bedford at 989.583.4045 (karen.bedford@chs-mi.com) or Dr. Sullivan at 989.583.7351 (msullivan@chs-mi.com) for medical staff concerns.

FIGURE 2 Independent Physicians and NP/PAs Still Show Strong Alignment



Benchmarks applied: Independent medical staff only, Affiliated through a PHO or IPA; MD or DO, DDS or DMD
 Benchmarks applied: Employed through a contract; PA, NP or other advanced practice nurse

FIGURE 3

A Clear Gap Between Physicians and NP/PAs

Covenant-Employed Physicians and NP/PAs

Percent Engaged, 2017-2019

52.4%

47.9%

35.7%

36.7%

Physicians

n=96

n=30

■ 2017

■ 2019

• Median

• 75th %tile

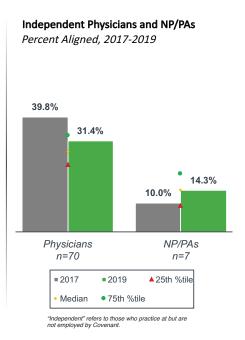


TABLE 1

Provider Actions

FOCUS	NEXT STEPS
Disruptive Behavior	Work toward continued adoption of "Our Covenant" compact through presentation of a minimum of two physician training modules and expansion of dinner group
Epic Improvements	Continue implementation of IT Strategic Plan
Burnout	Formation of Physician Burnout Task Force Identification of Resources Work/life Balance Initiatives Epic Optimization
NP/PA Role	Explore new avenues to better address Advanced Practice Provider governance and communication

[&]quot;Independent" refers to those who practice at but are not employed by Covenant.



Extraordinary care for every generation.

Covenant HealthCare 1447 North Harrison Saginaw, Michigan 48602

The Covenant Chart is published four times a year. Send submissions to: Jennifer Behm, Physician Liaison jennifer.behm@chs-mi.com 989.583.4051 Tel 989.583.4036 Fax

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THE CHART SPOTLIGHTS

CONGRATULATIONS PHYSICIANS OF THE MONTH!

Your patients and colleagues are saying extraordinary things...



JULY

Dr. Sujal Patel | GENERAL/TRAUMA SURGERY

"Dr. Patel is the best! He has seen me through some very difficult surgeries in the past. I feel very safe with him. When hospitalized at Covenant I had exceptional care. The outcome of kindness and caring was amazing!"

"Dr. Patel was very thorough in answering my questions and giving me advice. I greatly appreciate the time he took with me."

"This was a follow-up visit after surgery. Dr. Patel was a great surgeon for my situation. Well pleased with Dr. Patel and staff."



AUGUST

Dr. Adam Hunt | EMERGENCY MEDICINE

"Dr. Hunt was very compassionate and went out of his way to make me comfortable and understand what was going on at all times. I could not have asked for a better physician."

"My son has anxiety and the doctors and nurses made him feel so comfortable. As a mom, that's what I needed; I felt so good."

"Good experience. Dr. Adam Hunt is a caring man; was excellent in explaining my condition. He has a great attitude."



SEPTEMBER

Dr. Bashar Al Jayyousi | Cardiology

"Dr. Al Jayyousi is a very professional, compassionate and caring doctor and I feel lucky to have him caring for me. He always takes the time to explain every detail of his care!"

"I love my heart doctor. He is the best, kindest doctor and a really good listener."

"This office is doing something right. I always feel well-cared for and listened to. I enjoy seeing and speaking with every member of the staff at this office."