ADULT SICKLE CELL PROGRAM

ANNUAL REPORT

The **University of Arkansas for Medical Sciences Division of Hematology and Oncology in the Department of Internal Medicine** has partnered with the **Institute for Digital Health & Innovation (IDHI)** to create a statewide system of support for patients with sickle cell disease (SCD), and for the physicians who care for them. As UAMS improves and standardizes the treatment of patients with sickle cell disease through the **Adult Sickle Cell Clinical Program,** patients throughout the state with SCD will experience an improved quality of life.

Joseph Sanford, M.D.
Director
Institute for Digital Health & Innovation

Rosalyn Perkins, MNSc, WHNP-BC
IDHI, APRN Coordinator

Collin V. Montgomery, MNSc, APRN Coordinator
UAMS Adult Sickle Cell Program

Table of Contents

This annual report was produced by Creative Services and the Office of Communications & Marketing, University of Arkansas for Medical Sciences

Writing: Karmen Robinson, Graphic Design: Leslie Norris, Photography:Bryan Clifton and Karmen Robinson

FROM THE PROGRAM DIRECTOR

The UAMS Adult Sickle Cell Program launched in 2014 to provide the best possible care for patients with sickle cell disease in Arkansas.

As the state's only program for adult sickle cell patients, we collaborate with primary care physicians across the entire state, providing resources and individualized treatment plans for patients.

Sickle cell patients were dying at young ages from the disease just a few decades ago, and Arkansas Children's established the Sickle Cell Disease Program to give our children and communities the specialty care needed to combat the disease.

Our program builds on that foundation to provide specialized care for adults — all under one umbrella—, ultimately enhancing our patients' quality of life and increasing their longevity.

Sickle cell disease forms abnormally-shaped red blood cells that plug small blood vessels and restrict oxygen from travelling through the body to help organs function properly. As a result, patients suffer from organ and tissue damage resulting in severe pain episodes, known as a crises, which require treatment and sometimes hospitalization.

Implementing structured treatment plans early in their lives and throughout the continuum of care allows us to make a positive impact in an effort to optimize functionality and quality of life.

Additionally, with an individualized plan of care, we can minimize complications that accompany the disease, many of which lead to complex health challenges.

With an estimated 350 patients from all over the state, our program is the only adult clinic dedicated to comprehensive adult sickle cell management. Before the inception of our clinic, many adults with sickle cell disease in Arkansas had limited access to specialized care.

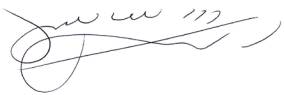
As a result of the COVID-19 pandemic, we had to curtail the number of visits to the clinic, but recent changes in digital health policies allowed us to conduct virtual visits with our patients, which they loved. Our staff strengthened relationships with patients in new ways, getting a glimpse into their lives at home as the clinical staff and patients alike comfortably adapted to digital health.

Through the successful rollout of the UAMS vaccination campaign, we've been able to serve patients in the clinic again.

Although we have made significant strides in managing pain and updating treatment plans, the next horizon is finding a cure for sickle cell disease, which is most prevalent in minority communities.

There are currently two curative interventions available: gene therapy and bone marrow transplant. At this time our program collaborates with patients and other health care centers to make these interventions available to this population. In the future, we are hopeful to expand our services to include these treatment options.

Our team looks forward to continuing to serve this patient population through evidence-based management.



Issam Makhoul, M.D.
Director, UAMS Adult Sickle Cell Program

Sickle Cell Disease Changed Business Owner's Path, Helped Him Find His Passion

"I think God's had me here for so long because it's my calling to help people out and take care of people. I try to help people because somewhere along the line, **someone was helping me.**"

Growing up, Michaela Davis enjoyed shooting hoops, but limitations he faced due to sickle cell disease prevented him from playing on school teams. At the time, he was frustrated with the limitations, but he learned later that his condition gives him purpose and allows him to help others.

Shifting away from sports, Davis found passion for drawing as a child, mostly depicting himself and his friends as super heroes, but at 11 years old, he traded in his sketch pad for a different type of canvas. Spending most of his childhood in auto body shops with his family, he started painting cars with his father and uncle – a talent he later turned into a business.

Davis, 47, is a Shelby, Mississippi, native and the oldest of six children, and he was diagnosed with sickle cell disease when he was 4 years old. His parents and each of his siblings carry the sickle cell trait, but he's the only one in his family who has sickle cell disease.

"I was hurting all the time," said Davis. Referring to his diagnosis, "My grandma knew something was wrong with me."

Because his parents were both in the Air Force and stationed in Alaska, his grandmother assumed the role as his primary caregiver. Davis' grandmother, who was a nurse, taught him how to manage his condition, including the debilitating pain episodes, known as a pain crisis, which is the hallmark symptom of sickle cell disease.

Despite his best efforts at managing his disease, Davis faced many occupational challenges.

After graduating from high school, he worked several jobs, but sickle cell complications resulted in many missed days of work.

"When I was working at a pizza place, I had a crisis and had to be in the hospital for three or four days, and when I came back, they fired me," he said. Unfortunately, the unpredictable nature of sickle cell disease caused Davis to experience frequent cycles of unemployment.

"It just wasn't working out. Every job that I got, everything that I did, I got fired. Sometimes I just dealt with the pain because I needed the money," he said.

Knowing that his health was priority, Davis chose a different occupational path.

"The only way I could see myself succeeding was if I was in business for myself," said Davis. "That way if I have a crisis and have to be in the hospital for a few days, it's still mine. No one can fire me, and no one can take it from me."

Davis later relocated to Little Rock and worked as an independent contractor for car dealerships, using his longtime experience in auto body repair and painting cars, specializing in chameleon candy paint.

"My dad and my uncle used to do body work, and my uncle used to paint. I was always in the shop with them every single day," he said. "I just picked up on it and started mixing paints together. I enjoy painting. It's like my therapy sometimes, so I just grew a passion for it."

Davis grew his statewide clientele through his relationships with local car dealerships. "I started wondering what I could do on my own," Davis mused. This motivated him to develop a business plan and recruit family to make his occupational dreams come true.

In 2013, he opened Arianna's Paint & Body

Shop in Little Rock – named after his daughter.

In early 2021, he opened a second shop in Springfield, Missouri, and regularly travels between the two states to run both shops.

Davis said he feels blessed that he's now in the position to provide job opportunities for others, especially as someone who experienced difficulty finding stable employment.

"My doctor told me when he was coming up in medical school, sickle cell patients weren't living past 18 or 19," he said.

"I think God's had me here for so long because it's my calling to help people out and take care of people. I try to help people because somewhere along the line, someone was helping me."

Davis credits his success to his support system, and he hopes to make the same positive impact on others.

"I have people who love me and care about me and look up to me, so I try to be that good role model. I try to be the best father, husband, son and friend I can be."

While Davis admits he faced setbacks on his challenging road to entrepreneurship, the married father of four said it all paid off in the end and that his children were his motivation. In addition to 16 year-old Mikayla Arianna, Davis has two more daughters – Dominique, 30, and Ashaya, 11 – and one son, Niko, 7.

"They love me, and I love them. That's why I try to take care of myself because I don't want to leave them. I want to see them graduate," he said. "I have a 7 year-old son, and he's not going to understand if he comes home and something happens to his dad."

Davis attends the UAMS Adult Sickle Cell Clinic for disease management. On average, he experiences a pain crisis about every two months. As with most sickle cell disease patients, he attempts to avoid hospitalization by adhering to his personal plan of care provided by the Multidisciplinary Clinic team.

"I don't have time to sit in the hospital," he said. "If I'm feeling good, if my blood count is up and I'm stable, then I'm ready to go. I have a family, a wife, kids and a business, but when I have a crisis, I know I need to slow down." Indeed, Davis works diligently to strike a healthy balance between his health, family life and passion for painting cars.

TRANSITION PROJECT

For sickle cell disease (SCD) patients, the transition from pediatric to adult care is often a risky time period. During this time, SCD patients often experience a fragmentation in their health care providers and, in turn, their clinical care. Pediatric SCD patients have the option to receive sickle cell management at Arkansas Children's Hospital (ACH) until age 21. However, pediatric SCD patients may begin transitioning care to the UAMS Adult Sickle Cell Clinic at age 18. The clinical transition from pediatric to adult care begins years in advance and these age ranges provide SCD patients individualized plans to ensure more comprehensive care.
A key effort during this period is providing a social worker in a dually embedded role at the ACH Pediatric Sickle Cell Clinic and the UAMS Adult Sickle Cell Clinic in order to develop

FOUR

Patients have transititoned their care from ACH to UAMS during this fiscal year

TRANSITION PROJECT

relationships with patients and assist them in successfully transitioning their care to an adult health care provider. The UAMS social worker and the pediatric team have implemented an educational program to help patients prepare for transition. Biannually, patients are provided written and verbal education on various topics, including psychosocial aspects, of their disease. The program ensures every patient receives education on all aspects of their disease and is prepared to transition. In the dual role, the UAMS social worker assists patients with establishing an adult primary care provider in their community (if/when appropriate), as well as their initial appointment at the UAMS Sickle Cell Clinic. Additionally, the UAMS Sickle Cell Multidisciplinary Clinic team meets with the Pediatric Sickle Cell team at ACH on a biannual basis to review patients who will transition within the next six months. These meetings ensure continuity of care for patients and help strengthen the collaboration between the two clinics.

- **4 patients** have transitioned their care from ACH to UAMS during fiscal year 2021.
- **86 patients** at ACH are age 16 or older and interact with the UAMS social worker during ACH clinic appointments.

ADULT SICKLE CELL MULTIDISCIPLINARY CLINIC

Front: Collin Montgomery, APRN; Second Row (L to R): Lindsey Dayer, Pharm,D,. and Leigh Ann Wilson, LCSW; Third Row (L to R): Issam Makhoul, M.D., and Stella Bowers, RN

The UAMS Adult Sickle Cell Program uses a multidisciplinary approach to manage adult patients with sickle cell disease. The clinic provides services to patients across Arkansas.

Frequency of clinic visits vary based on each patient's disease severity. Visits can range from monthly to annually or more frequently as indicated. Comprehensive care is tailored to meet the individual needs of each patient. In order to ensure holistic management, the UAMS Adult Sickle Cell Clinical Program maintains communication regarding sickle cell management with each patient's primary care provider.

The Multidisciplinary Clinic at UAMS includes a team of hematologists led by Issam Makhoul, M.D.

A nurse practitioner, Collin Montgomery, APRN, works in collaboration with the team to deliver and facilitate holistic care through assessment, treatment plan development, and maintenance and follow-up.

A licensed clinical social worker, Leigh Ann Wilson assists patients and their families with social and emotional support, health-related expenses for the under/un-insured, transportation costs and employment options. Additionally, Wilson works with patients, families and staff to promote successful transition from pediatric care to the adult clinical setting.

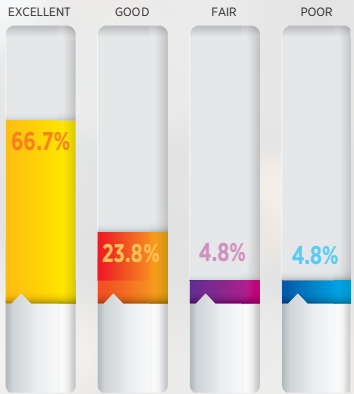
A registered nurse, Stella Bowers, provides care to patients in the outpatient setting. She also serves as the community outreach coordinator. Bowers fosters and maintains relationships between the clinical staff, community and health care providers around Arkansas. In addition, she is the liaison between the call center staff, patients and theSickle Cell team.

A pharmacist, Lindsey Dayer, Pharm.D., provides medication management through comprehensive medication reconciliation and medication counseling. She also assesses medication efficacy.

PATIENT SATISFACTION SURVEYS

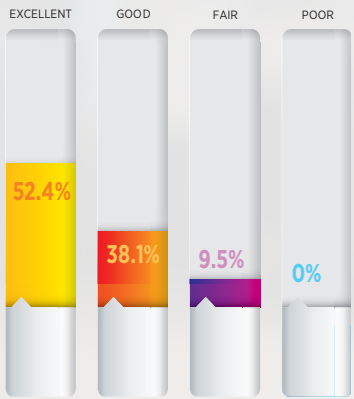
1

How did the Sickle Cell Team do at...
Making you feel at ease?



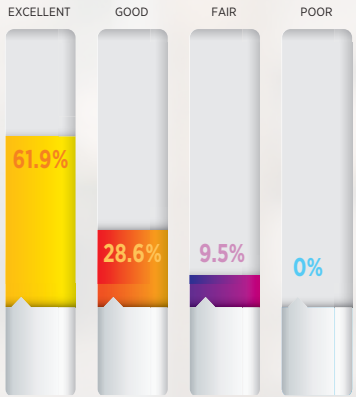
2

How did the Sickle Cell Team do at...
Listening to your concerns?



3

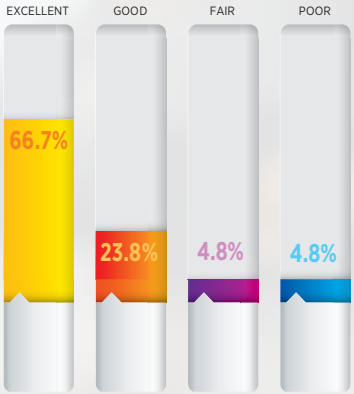
How did the Sickle Cell Team do at...
Answering all your questions patiently?



PATIENT SATISFACTION SURVEYS

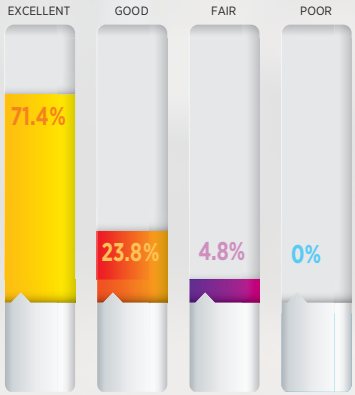
4

How did the Sickle Cell Team do at...
Showing respect for what you had to say?



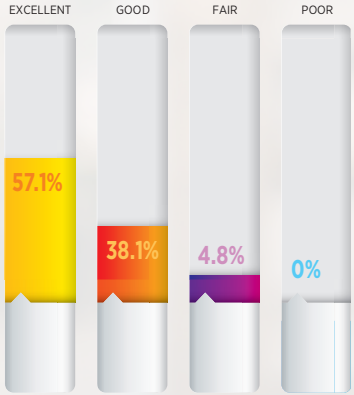
5

How did the Sickle Cell Team do at...
Giving you advice on improving your health?



6

How did the Sickle Cell Team do at...
Thoroughness of the examination?

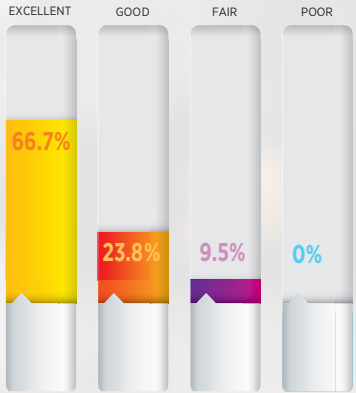


PATIENT SATISFACTION SURVEYS

21
Adult Sickle Cell Patients Participated

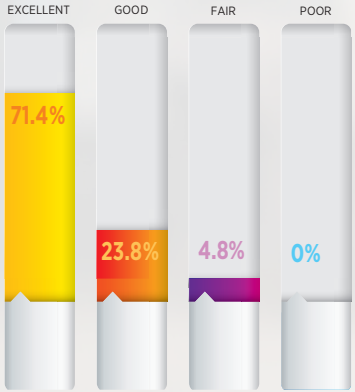
7

How did the Sickle Cell Team do at... **Explaining things in a way that was easy to understand?**

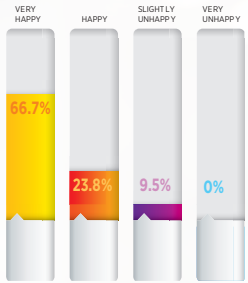


8

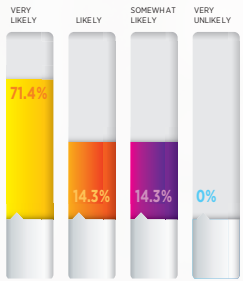
How did the Sickle Cell Team do at... **Explanation of your medication?**



Overall, how happy were you with the care given to you?



How likely are you to **recommend this clinic to your family and friends?**



CALL CENTER

Sickle cell patients can access the Call Center 24 hours a day, seven days a week. The Call Center is managed by the Institute for Digital Health & Innovation.

Patients can call in with immediate problems, which are triaged by a registered nurse. The triage nurse may advise the patient to go to the Emergency Department (ED) for immediate care, schedule a clinic appointment, come in for an outpatient infusion treatment or provide assistance with self-care management at home. Giving the patients direct access to a triage nurse familiar with sickle cell disease, as well as a dedicated Adult Sickle Cell Clinical Program team providing secondary-level triage, helps patients to determine their next step in treatment.

The call center functions as a resource to patients, physicians and providers, and the community. It is accessible for Arkansas residents, those residing outside of the state, as well as internationally. If physicians and providers have questions concerning patient care or would like to refer a patient to the Sickle Cell Clinical Program, the call center may assist them. The Call Center provides an important component to the Sickle Cell Program and helps the program to reach the goal of becoming a statewide resource to patients, providers and the community in the state of Arkansas and beyond.

Assisting patients and providers is a major part of The Sickle Cell Call Center, but the center also assists the general public.

Digital Health Support

24/7
Call Center with Sickle Cell hotline

Staffed by experienced RNs who can offer:

- Education concerning acute and chronic health problems related to sickle cell disease
- Telephone triage for patients with immediate health concerns
  - Emotional Support
  - Assistance with medication refills
  - Home Care instructions to lessen symptoms
  - Secondary-level triage (calling Sickle Cell Team Member) before sending patient to ED, giving alternatives to ED visit when appropriate
- Doc to Doc consults - supporting primary care, ED, and other providers caring for sickle cell patients across the state

- Triage
- Disease/Health Information
- Reporting of Treatment Event for Registry
- MD Consult or Transfer
- New Placement on Registry
- Other

- ED and/or 911
- Call back by MD/clinic nurse/RX
- Schedule Immediate Appointment
  (includes clinic or infusion appointments)
- Self Care

EDUCATION AND OUTREACH

Despite the COVID-19 pandemic, the mission of our program continues to focus on spreading awareness and education on sickle cell disease (SCD). However, education opportunities have been limited this year. We have relied on technology during this time to continue to spread awareness and education. Digital health has been very beneficial in clinic and providing a platform for education and information to our patients. Moving forward, we have increased our in-person clinic visits but are still limiting contact with other areas in the hospital. We have plans of restarting outpatient infusions for pain. Our first priority continues to be our patient's safety.

This year, the Annual Symposium took place via Zoom and focused on the inequality and bias in care for SCD patients. The three speakers included: Sarah Council, Ph. D, a research writer for the UAMS Division of Hematology and Oncology, who discussed "Stigma in Sickle Cell Disease: The intersection of race, disease and bias;" Susan Saccente M.D., a pediatric hematologist and medical director of the Sickle Cell Program and Apheresis Program at Arkansas Children's, who discussed inequality of funding for SCD research; and Collin Montgomery, APRN, for the UAMS Adult Sickle Cell Program who discussed "Matters of Black Health: Perception versus Reality of Living with Sickle Cell Disease." Montgomery's presentation featured interviews with SCD patients who discussed their experiences in sickle cell care. Due to the pandemic we were unable to partner with Future Builders and the Little Rock Black Nurses Ph.D, but we are looking forward to continuing our partnership in the years to come. Stella Bowers, RN, for the UAMS Adult Sickle Cell Program presented in the Future Builders Zoom education presentation, "Sickle Cell Disease: Our Stories."

Connecting Across Professions talks are another source of education. The program utilizes these lectures to educate providers and other health

EDUCATION AND OUTREACH

care workers. We typically provide two to six talks yearly, but due to the pandemic we were only able to provide four talks.

Community education through visiting health fairs, conferences, schools, churches and other venues raising awareness of SCD and the Adult Sickle Cell Clinical Program has been limited.

Education and outreach been a challenge over the last year, but we are always available via our call center, and education is available through the UAMS patient education site. We look forward to safely shifting back to community education and outreach in order to continue to raise awareness of SCD.

RAISING AWARENESS THROUGH

OUTREACH

Health Care Providers

Continuing to reach out to statewide Primary Care clinics through:

- **UAMS Physician Relations team**—carry and distribute our program information when visiting referring doctors around Arkansas
- **AFMC**—our information is on their website. Their representatives carry and distribute our program information when visiting doctors around the state.
- **Medical Conferences booths and speaking events** (see outreach report). Vendor booths provide contact with new physicians. Disease education is offered through table display, literature handouts and encounters with outreach nurses. Booth visitors are also invited to leave their contact information if they'd like us to follow up with more information.

Communities

- Outreach nurse (or team member) attends community events (health fairs/company meetings/club meetings)to speak at events and/or having booth with educational/program materials. (See outreach report)

Symposium Spotlights **Social Burdens of Sickle Cell Disease Treatment**

By Ben Boulden

Racial bias, the opioid crisis and the stigma of suspected drug use often make getting access to treatment a frustrating struggle for adult sickle cell patients.

In a short video that opened the UAMS Sickle Cell Symposium on Feb. 2, sickle cell disease patients spoke about the attitudes of physicians and nurses that often seem to stand in their way of getting access to treatment for pain crises caused by the disease.

"When they don't believe me, I assume they think I am drug-seeking and only want the medications," one young woman named Kennede said. "Actually, I hate taking pain medications, and only go to the hospital when I absolutely need them."

Kennede

Sponsored by the UAMS Adult Sickle Cell Clinical Program, the symposium was streamed live on Zoom this year. Thirty participants made up the online audience.

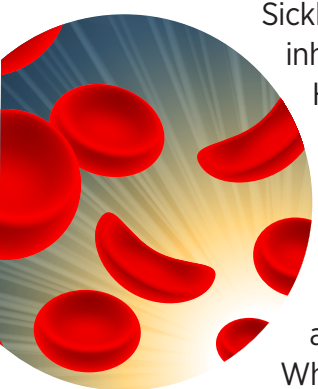
Stigma and bias mean "the burden of illness becomes greater than it should be," said Sarah

EDUCATION AND OUTREACH

Council, Ph.D., one of three presenters at the symposium. She is a research writer for the UAMS Division of Hematology and Oncology.

"In a study of 77 sickle cell patients, they found significant associations between the measure of stigma and their depressive symptoms," Council said. "Patients reported greater stigma and higher scores on a depression scale. It's a self-feeding mechanism of stigma and racial discrimination."

The overwhelming majority of sickle cell disease patients are Black.



Sickle cell disease is a group of inherited red blood cell disorders. Healthy red blood cells are round and travel through small blood vessels to carry oxygen throughout the body. With sickle cell disease, the red blood cells become hard and sticky, and result in a C-shape or "sickle." When sickle cells travel to small blood vessels, they get trapped and block blood flow to the area. This results in pain and may lead to other problems such as infection, acute chest syndrome and stroke.

During a pain crisis, sickle cell disease patients often seek immediate treatment for their pain in hospital Emergency Departments, where they are seen by physicians or resident physicians who have little experience treating patients with sickle cell disease.

"People like us who have had sickle cell their entire lives may not express pain the same way as someone else," Kennede said in the video. "We might not cry or crawl on the floor or anything, our pain tolerance is very high, so you can't see we're in pain sometimes. That's the case with me."

Council said clinicians in those settings often are skeptical of pain complaints and suspect sickle cell patients are merely seeking drugs. The national opioid crisis has brought increases in opioid-use related deaths and added to their hesitancy in prescribing pain medications.

"When you think about the overlay of race onto the families of my patients with sickle cell disease, it's very real and affects them financially," said Suzanne Saccente, M.D. "It affects their jobs and all aspects of their lives and then we have a life-threatening disease that worsens as they age. Now, we've overlaid the opioid crisis on top

of that in the last five to 10 years. It's made their ability to receive care that much harder."

She said the bias even extends into research funding.

Cystic fibrosis is a disease of the lung that affects primarily Caucasian people, and affects a third fewer patients than sickle cell disease does, Saccente said. However, when it comes to research funding, cystic fibrosis receives seven to 11 times more research funding than sickle cell disease.

Because sickle cell disease is a genetic disease that many patients begin to experience in infancy or childhood, by the time they are adults they have gained personal experience managing their disease and knowledge of the most effective, specific ways of treating a pain crisis. They often will ask for a specific drug or drugs by name and

suggest a dosage, which can lead to a physician with little experience treating sickle cell disease to suspect they are drug seeking, said Collin Montgomery, APRN, co-director of the UAMS Adult Sickle Cell Disease Clinical Program.

"A patient being able to request a specific medicine at a certain dose should be something we expect as health care providers. I don't want to reinvent the wheel," Montgomery said. "Plans should be individualized to each patient's needs. There isn't a one size fits all treatment with sickle cell patients."

Saccente said she tries to reach new resident physicians early in their residencies and teach them about the disease before they encounter a sickle cell patient.

"To counter bias, there has to be more education pushed down from the top," Montgomery said. "Unfortunately, a lot of people are unaware of their bias. In taking care of sickle cell patients, I say, 'Know your bias and know how to manage it.' We're human and all have potential for bias. We have a team approach that provides some checks and balances."

Part of helping patients communicate their needs to physicians and nurses to facilitate their treatment also involves some patient education, too.

"I hate to say it, but we even give them scripts. 'If this happens, then you should say this.' A lot of time we have to tell them what not to do, to not get angry or yell. We help them to ward off behaviors that fuel stigma," Montgomery said.

Wilson & Montgomery receive 2020 Chris Hackler Award

Two employees who work with the Adult Sickle Cell Disease Clinical Program at the University of Arkansas for Medical Sciences (UAMS) recently received the 2020 Chris Hackler Award for Excellence in Medical Ethics.

Social worker Leigh Ann Wilson and Collin V. Montgomery, APRN, assist UAMS' sickle cell patients. Sickle cell disease is a genetic disease that affects the red blood cells; many patients begin experiencing pain and other complications from the disease in infancy or childhood.

The University Hospital Medical Ethics Advisory Committee presents the award each academic year to recognize residents, faculty and other employees in the UAMS College of Medicine who have, in their work, demonstrated exemplary attention to ethical issues that affect patient care.

Wilson helps patients identify assistance during treatment and Montgomery works as a coordinator of the program, often advocating for her patients. Wilson received the non-faculty award and Montgomery received the faculty one.

"I feel truly honored to receive this award," said Wilson, who is a part of the Winthrop P. Rockefeller Cancer Institute Social Work Department. "I have always strived to treat

everyone I encounter with dignity and respect. For me, this award is recognition of that effort."

Wilson's and Montgomery's names were added to a pair of plaques displayed on a wall in the foyer of UAMS Medical Center, along with the names of 33 others who have received the award since it began in 2005.

Nicholas Tingquist, M.D., a surgery resident who has since completed his residency and is in a cardiothoracic fellowship at Vanderbilt University Medical Center in Nashville, Tennessee, received the award in the resident category. His award was mailed to him.

"He holds the highest degree of ethics and morals that I have seen in a resident," wrote Mary Katherine (Katie) Kimbrough, M.D., a physician and assistant professor in the Division of Trauma and Critical Care Surgery in the College of Medicine, in her nomination of him. "He always does the right thing for the patient, even when it's sometimes the hardest thing to do."

Nihit Kumar, M.D., assistant professor of psychiatry with the College of Medicine, presented individual plaques to Wilson and Montgomery during a recent afternoon ceremony in the Walton Auditorium of the Cancer Institute.

"Every year for the past 15 years we have recognized some exceptional individuals for their contributions to the field of medical ethics and we are here today to honor two such individuals," Kumar said.

Collin Montgomery, APRN

"Collin Montgomery, APRN coordinator of the UAMS Adult Sickle Cell Disease Clinic Program, collaborates with hematologists and key clinical care members to coordinate outpatient care for sickle cell disease patients and is also critical to providing development and oversight," Kumar said, quoting Sarah Council, Ph.D., a research writer for the UAMS Division of Hematology and Oncology, who nominated Montgomery and Wilson. "She has demonstrated a passion for providing comprehensive care for sickle cell disease patients."

He added that aggressive pain is a hallmark symptom of the disease. The pain, which is treated with opioids, and racism can lead to

patients, especially those admitted to the hospital, being labeled addicts or pain medicine seekers, resulting in them not receiving adequate care for pain management.

"She is dedicated to ongoing clinical education and patient privacy at UAMS and throughout the state," Kumar said of Montgomery. "She continually advocates and promotes appropriate and just treatment for her sickle cell disease patients."

"It is truly an honor to receive the Chris Hackler Ethics Award," Montgomery said. "I hope my efforts will continue to improve care equity for the patients I serve."

Leigh Ann Wilson

Wilson provides support to patients, families and caregivers in the clinic and also works in the pediatric sickle cell program at Arkansas Children's Hospital. In her dual role, she assists with health-related expenses not covered by insurance, transportation costs and employment options.

Wilson also helps patients as they shift from being a pediatric patient to an adult one.

"The health care transition is a risky time for sickle cell disease patients as they often experience a fragmentation in their health care providers," said Kumar, adding that Wilson ensures her patients receive the care they need.

"She begins the transition process years before to prepare her pediatric patients to be responsible for their health care. She displays a heartfelt drive to tend to the psychological and social needs of her patients and works passionately to advocate for them, whether that be as outpatient, inpatient, their workplaces or their homes."

UAMS

Institute for Digital
Health & Innovation

To utilize the service of this program
call the 24/7 Call Center
at **1-855-Sic-Cell (742-2355)**

For more information visit
sicklecell.uams.edu