

Brandon
is a lifesaver!



2019 - 2020 COMMUNITY REPORT

Saving Lives Close To Home

Saving Lives Close To Home

Our Mission

To enhance the well-being of patients in our service area by assuring a reliable and economical supply of the safest possible blood, by providing innovative hemotherapy services, and by promoting research and education programs in transfusion medicine.

Our Vision

Hoxworth Blood Center will be recognized for saving and improving lives in our community with safe and reliable blood and innovative cell therapies.



From The Director

José Cancelas, MD, PhD
Chief Executive Officer

As I look at the past year and the months ahead, we have seen many changes. We have all experienced adjustments in how we go about our daily lives. Masks are now worn in public settings, schools and businesses have been operating on remote schedules, social distancing is now the norm, hundreds of restaurants saw closures, and many cities enacted curfews.

Despite all of these changes, the need for blood donation has remained constant. Our local and national government officials have made pleas to the community that blood donation continues to remain a priority. Hoxworth enacted many safety precautions for our donors and staff at the very beginning of the pandemic, including temperature checks, the mandatory wearing of masks, social distancing inside donor centers and mobile units, and wiping down all solid surfaces between donors.

Additionally, convalescent plasma has been deemed a treatment protocol for those actively fighting the virus. Hoxworth Blood Center was at the

forefront of this initiative, and was one of the first blood centers to begin collecting and distributing the lifesaving product in April.

In these times of change, we must remember our mission to save lives. With that comes a reminder that whether you donate blood, platelets, time, or money to Hoxworth Blood Center, you are saving lives close to home. The lives of family, friends, colleagues, and neighbors receiving care at more than 30 Tri-State hospitals will benefit from your generosity.

Although we have seen many changes in the past several months, we will stand ready for whatever the future holds. Hoxworth Blood Center will continue to be a leader in research projects for the advancement of transfusion medicine and remain the steward of our local blood supply with an annual collection goal of 99,000 products.

On behalf of the entire team at Hoxworth Blood Center, I thank you for your past and future contributions. It is with your support that we will continue our mission of *Saving Lives Close to Home*.

Internationally Recognized Leader in Transfusion Medicine

Hoxworth Blood Center, University of Cincinnati, is the only blood center in the Greater Cincinnati area. Serving Ohio, Kentucky and Indiana, Hoxworth collects, tests, processes and distributes blood and blood components to more than 30 area hospitals and medical facilities. Founded by Dr. Paul I. Hoxworth in 1938, Hoxworth Blood Center has become an internationally recognized leader in transfusion medicine. Today, Hoxworth has a staff of more than 270 full-time and part-time employees in 21 departments and a complement of more than 300 volunteers.

Hoxworth Senior Leadership Team

Cabinet Members



• **José Cancelas**
MD, PhD
Director



• **Christopher Nare**
MS, MT (AMT)
Associate Director
Chief Operating Officer



• **David Oh**
MD
Chief Medical Officer



• **Scott Inscho**
CPA
Chief Financial Officer



Caroline Alquist
MD, PhD
Division Director
Transplantation
Immunology



Judith Gonzalez
BS, MT (ASCP), CLS
Division Director
Laboratories



Janice Habel
BS, MT (ASCP)
Division Director
Quality Assurance



Ben King
BS
Division Director
Donor Operations



Tom Leemhuis
PhD
Division Director
Cellular Therapies



Rufan Li
MS, MBA
Division Director
Chief Marketing
Officer



Alecia Lipton
MHA
Division Director
Public Relations



Carolyn Lutzko
PhD
Division Director
Regenerative Medicine
Cellular Therapies

Community Advisory Board

Richard Aft, PhD, Philanthropic Leadership
Dawn Berryman, Leukemia & Lymphoma Society
John Byczkowski, Federal Home Loan Bank of Cincinnati
Bernie Calonge, Marsh
Alfonso Cornejo, Hispanic Chamber of Commerce
Phillip Diller, MD, PhD, UC College of Medicine
Andrew Filak, MD, UC Academic Health Center
Clyde Gray, WCPO
Rick Hall, Fidelity Investments
Carla Howard, Kelly Youth Services
Myron Hughes, BlueRose Supply
Patrick Kowalski, University of Cincinnati
Michael Losos, MD, Cincinnati Children's Hospital Med. Center
Barry Massa, LifeCenter Organ Donor Network
Joe Michels, Michels Construction
Melba R. Moore, PhD, MS, CPHA, Cincinnati Health Dept.
Matt Morgan, Grant County School District
Kathrine Nero, Cincinnati Enquirer
Colleen O'Toole, PhD, The Health Collaborative
Ronald A. Sacher, MD, Hoxworth Blood Center (Emeritus)
Mark S. Schlachter, Heavy Metal Mark
Robert J. Sinkhorn, Affect Partners LLC
Paul Turnpaugh, General Electric
Jill Waters, Highpoint Health

#WeAreHoxworth



Fundraising Initiatives

Hoxworth Blood Center is fortunate to have financial support from the community to further our mission of Saving Lives Close to Home. Our fundraising goal this year focused on the purchase of a new bloodmobile, and Hoxworth's annual September golf outing raised \$38,315 toward this goal. Additionally, The Luther Charitable Foundation donated \$100,000 toward a new bloodmobile. Hoxworth also secured funding for its Convalescent Plasma program to support COVID-19 patients. The Warren Hardy and Karen Bell Fund of the Greater Cincinnati Foundation donated \$112,801.54 toward this program. The Greater Cincinnati Foundation also granted \$25,000 from its COVID-19 Regional Response Fund for Hoxworth's Convalescent Plasma collection effort. Hoxworth Blood Center is part of the University of Cincinnati, but does not receive funding from the State of Ohio for its operations. The non-profit center depends on the generosity of our community to help fulfill our mission of saving lives throughout the Tri-State. To make a tax deductible donation, send a check to Hoxworth Blood Center, Financial Services, University of Cincinnati, PO Box 670055, Cincinnati, Ohio 45267-0055, or visit: foundation.uc.edu/donate/hoxworth.

HOXWORTH PHILANTHROPY

Financial Donors
(July 1, 2019 – June 30, 2020)

Richard Aft
Ann Ahern
David Alexander
Dennis and Lisa Amrhein
Lois Barry
Lois Baumer
Karen Bell
Karen Bergin
Dawn Berryman
Bonnie Bilitch
James and Robin Boesken
Ms. Doris J. Brandes
Mr. and Mrs. Daniel Brinkmeyer
Michelle Bronstrop
Viola and Mark Bruns
Mary Burns
Susan J. Bussell
Dr. Terri and Mr. John Byczkowski
Clifford and Dina Calhoun
Bernardo Calonge
Beth Campbell
José Cancelas-Perez
Chris Carle
Terence and Jennifer Casey
Mr. and Mrs. Robert Clark
Robert Clark
Deborah Collins
Jim Collins
James and Sally Cook
Mrs. Katie F. Corbett
Mr. and Mrs. Christopher Crissman
Kendall Cunic
Bill Curry
Peggy Curry
Barth and Karen Davis
Dr. and Mrs. Philip Diller
Hollis Dold
Holly Fechtig
Dr. and Mrs. Andrew Filak, Jr.
Darrel and Kathryn Flaspohler
John and Connie Flaspohler
Kenneth Flaspohler
Dennis Fritz
Paul and Michelle Frodge

GE Foundation
Dwain and Kimberly Gesell
Glaspie
Judith Gonzalez
Clyde Gray
Greater Cincinnati Foundation
Patrick and Jan Habel
Warren Hardy
Jude Hehman
Stephen Hill-Harriss
David F. Hodapp
Myron Hughes
Elaine Hutchins
Mr. CJ Hyers
Scott Inscho
Christine James
Ms. Staci M. Jenkins
Michael Kane
Amy Kellogg
Denise and Christopher Knight
Jeanne and Barry Lake
Sandra Laudick
Dr. Tom Leemhuis
Mr. and Mrs. H. Dale Lindle
Mark and Alecia Lipton
Local 212 IBEW
Ms. Suzanne J. Lohbeck
Suzanne Lohbeck
Barry Massa
Matthew Deck Insurance Agency
Patricia and Donald McDuffee
Karen Menchion
Roy and Berna Meyer
Linda and David Meyers
Mr. and Mrs. Joseph Michels
Dr. Melba Morre
Mr. Thomas J. Noe and
Mrs. Pamela L. Volz-Noe
My Tribute Gift Foundation
Christopher Nare
Ohio Valley Foundation, Fifth
Third Bank
ONI Advertising
Deborah and Gerald Owsley

William and Kathleen Painter
Kenneth Peace and Sharon Holt
Linda Pearson
Richard A. Pohlman
Presbyterian Church of Wyoming
Pure Concept Salon
Mark and Felicia Rauch
David and Carol Raver
Katie Reckman
Nick Ritter
Mr. Dante M. Sanderson
Gary Scheer
Mark Schlachter
Patricia Schlimm
Chris J. Schoenberger
Mr. and Mrs. Kenneth Schrad
Kendra Schroer
Schwab Charitable Fund
Dennis and Sharon Schwegman
Vernon and Phyllis Schwegman
Glen and Judy Smith
Drs. John T. Spence and
Colleen K. O'Toole
Valerie and Dennis Stutler
Connie Sydnor
William and Aleen Thackery
The Health Collaborative
Mr. and Mrs. Thomas Reilly
Shannon Tracy
Paul Turnpaugh
Lucy Veid
Richard Veid
Adam Vizard
Roger and Kathy Wagner
Linda Weis
Margaret Wilson
Margie Witt
Mr. and Mrs. Gary Woebkenberg
Sharon Wynn

The COVID-19 Pandemic

Convalescent Plasma Collection Program has collected more than 2,000 units



“Hoxworth has expanded its lifesaving mission to include convalescent plasma for patients in critical need and is working to support all hospitals in the region seeking this therapy.”

– Dr. David Oh, Chief Medical Officer, Hoxworth Blood Center, working with Mollie Bell, BS, MLS (ASCP)^{CM}, SBB^{CM}, in the Immunohematology Reference Lab

Hoxworth was among the first blood centers in the country to begin the critical research of collecting convalescent Covid-19 plasma as a treatment option to help patients battling the virus.

A Spark of Hope

Hoxworth’s first convalescent plasma donors pave the way for recovery

Two recovered COVID-19 patients in the Cincinnati area offered a spark of hope in April just by rolling up their sleeves.

Mohammed Alagha and Dr. Robert Ernst were the first two individuals to donate convalescent plasma that could help the most critical COVID-19 patients in the Tri-State area.

In light of the COVID-19 outbreak, the FDA approved an Emergency Investigational New Drug (EIND) to allow the use of convalescent donor plasma for the treatment of the COVID-19 virus. Convalescent plasma is collected from recovered COVID-19 patients who are found to have developed significant numbers of antibodies in their plasma. Through transfusion, these antibodies improve the disease fighting response to the virus, acting as a boost to the immune system.

Alagha of Clifton and Ernst, a neuroradiologist with UC Health who lives in West Chester, knew immediately that they wanted to do something to help after they were diagnosed with COVID-19 in March. Both men learned that they could donate their plasma with Hoxworth Blood Center to help others.

“All I know that there is the potential to help people who are much sicker than I was,” Ernst said.

“It’s not about being nervous, but about us sharing responsibility and doing something to help. It’s so easy.”
– Mohammed Alagha
Convalescent Plasma donor



“These patients are fighting for their lives,” he said. “I think it’s important that we all need to help as much as we can. Anything I can do to help, I’ll do.”

Ernst’s and Alagha’s donation and the more than 1,600 people who registered to donate have had a huge impact. Thus far Hoxworth has collected nearly 2,500 units of convalescent plasma that has been separated and transfused to patients who are battling the virus.

“It’s important that we can do something for our community,” Alagha says. “It’s not about being nervous, but about us sharing responsibility and doing something to help. It’s so easy. I hope that people seeing me do this makes them feel better.”



Mohammed Alagha (top) and Dr. Robert Ernst were the first two individuals to donate convalescent plasma at Hoxworth. Their donations were used to help the most critically ill COVID-19 patients in the Tri-State.

TOP 10

List of Lifesavers

2019-2020 Collections

Our **Top 10** community blood drive partners collected a total of **33,986 units of blood**.

Saving Lives Close To Home

The COVID-19 pandemic

has caused unprecedented challenges to the U.S. blood supply. Many blood centers have experienced a reduction in donations due to social distancing and the cancellation of blood drives. Hoxworth is grateful to all donors and blood drive partners for helping us maintain an adequate, safe and ready blood supply.



Colleges

- | | |
|---------------------------------|-------|
| 1. University of Cincinnati | 1,723 |
| 2. Xavier University | 228 |
| 3. Northern Kentucky University | 179 |
| 4. Mount St. Joseph University | 84 |
| 5. Ivy Tech Community College | 62 |
| 6. God's Bible School & College | 33 |
| 7. Southern State Comm. College | 31 |
| 8. Galen College of Nursing | 25 |
| Beckfield College | 25 |
| 9. Thomas More University | 24 |
| Cincinnati Mortuary | 24 |
| 10. Cincinnati State | 1 |

Lifesaving Impact
15 total college participants
59 blood drives held

2,479 units collected

High Schools

- | | |
|---------------------------------|-----|
| 1. Princeton High School | 188 |
| 2. Mt. Notre Dame High School | 174 |
| 3. Sycamore High School | 170 |
| 4. Conner High School | 166 |
| Boone County Tech | 166 |
| 5. Scarlet Oaks Career Campus | 156 |
| 6. Lakota East High School | 124 |
| 7. Kings High School | 116 |
| 8. Loveland High School | 114 |
| Scott High School | 114 |
| 9. Hughes STEM High School | 108 |
| McNicholas High School | 108 |
| New Richmond High School | 108 |
| 10. Franklin County High School | 100 |
| South Dearborn High School | 100 |

Lifesaving Impact
78 total high school participants
93 blood drives held

3,504 units collected

Business Partners

- | | |
|-------------------------------|-------|
| 1. Kroger | 1,159 |
| 2. Busken Bakery | 529 |
| 3. Montgomery Inn | 473 |
| 4. Fifth Third Bank | 452 |
| 5. General Electric | 446 |
| 6. Procter & Gamble | 433 |
| 7. Cincinnati Financial Corp. | 337 |
| 8. Skyline Chili | 306 |
| 9. Ethicon | 301 |
| 10. Graeter's Ice Cream | 285 |

Lifesaving Impact
436 total business participants
747 blood drives held

18,321 units collected

Faith Partners

- | | |
|---|-----|
| 1. Crossroads Churches | 640 |
| 2. Cincinnati Church of Christ | 276 |
| 3. Trinity Lutheran Church, Mt. Healthy | 229 |
| 4. Still Waters Menonite Church | 216 |
| 5. 7 Hills Church | 207 |
| 6. Storm Bratchett Blood Drive | 204 |
| 7. Knights of Columbus Bright | 198 |
| 8. Immaculate Heart of Mary Catholic Church | 171 |
| 9. Brushy Fork Baptist and Pleasant Community | 170 |
| 10. Lakeside Christian Church | 157 |

Lifesaving Impact
90 total faith-based participants
145 blood drives held

5,398 units collected

Hospital Partners

- | | |
|--|-------|
| 1. Cincinnati Children's Hospital Medical Center | 2,388 |
| 2. TriHealth | 1,506 |
| 3. St. Elizabeth Healthcare | 857 |
| 4. UC Health | 690 |
| 5. Mercy Health | 474 |
| 6. The Christ Hospital | 450 |
| 7. Margaret Mary Hospital | 316 |
| 8. Highland District Hospital | 292 |
| 9. Highpoint Health | 236 |
| 10. Cincinnati VA Hospital | 214 |

Lifesaving Impact
38 total hospital participants
118 blood drives held

4,284 units collected



Lifesaving Impact

- 10 partners
- 51 blood drives
- 2,062 total donors
- 158 first-time donors
- 1,732 **UNITS COLLECTED**

Annual Blood Drive Event is a Partnership with Cincinnati’s Most Iconic Brands

Hoxworth celebrated its love for all things Cincinnati this summer with more than 50 dedicated blood drives to highlight our town’s favorite food places.

The Cincinnati Favorites Blood Drive Tour kicked off in July, featuring blood drives at partner foodie businesses such as Skyline Chili, Frisch’s, Montgomery Inn, Graeter’s Ice Cream, Busken Bakery, The BonBonerie, LaRosa’s, Taste of Belgium and Aglamesis Bros.

Now in its second year, the hugely popular event that ran through September collected more than 1,700 units of blood and saved an

estimated 5,196 lives right here in the Tri-State.

All donors received a signature Cincinnati Favorites T-shirt, as well as gifts and vouchers from participating sponsors. Donors were treated to everything from a Big Boy, cheese coney and pizza to ice cream, coffee and desserts.

Hoxworth hopes to grow the event next year with more participating sponsors.

“We’re looking for more of Cincinnati’s favorite food establishments to join the tour next year and help us save more lives,” says Alecia Lipton, director of Hoxworth public relations. “That’s always the mission, to save more lives.”



Honorary Blood Drive Celebrates Lifesaving Milestone

In honor of an incredible journey and as a way to pay it forward to help others in need of lifesaving blood donations, many recipients and their families, in turn, become donors.

These recipients and/or their families host special blood drives as a celebratory medical milestone or as a way to honor the memory of a loved one. In the end, the mission is the same: save more lives in the Greater Cincinnati community.

Brynn Schulte’s family marked her first birthday with a blood drive as a salute to her good health and to support the battle she and many others continue to fight. The honorary blood drive will become a family tradition, says Brynn’s mother Lindsay.

“We want to show our gratitude by giving back, as well as bringing awareness to how important and EASY donating blood can be,” Lindsay says. “People want to ‘help’ or ‘give’ in times of crisis, and this blood drive is a way for people to truly give back.”

Shortly after her July 2019 birth, Brynn had a brain bleed and surgery to relieve pressure. Brynn fought for survival, receiving blood transfusions and a startling diagnosis.

“Our sweet and special Brynn has been diagnosed with factor XIII deficiency,” Lindsay says. “It’s a VERY rare blood disorder, 1 in 5 million.” Lindsay says. “She’s ‘red carpet’ status at Cincinnati Children’s, as it is the first case they have ever seen or treated. The research team at Children’s helped us confirm this



Baby Brynn’s Birthday Blood Drive collected:

52 lifesaving units

recessive gene disorder. While her long-term care is constant, we are so thankful for her life. We call her our ‘winning lottery ticket’--1 in 5 million.”

Today, Brynn Nicole Schulte is growing into a happy, healthy, lively little girl. Cincinnati Children’s Hospital Medical Center and blood donors played a critical role in Brynn’s survival, a fact that her parents don’t want to take for granted.

Thanks to Children’s and Hoxworth donors, Brynn celebrated her first birthday in July 2020, with an eye toward a bright future.



Lifesaving as an Art

Themed blood drives are growing in popularity, and this year Hoxworth Blood Center joined forces with the local arts scene for a successful blood drive at Music Hall.

The Cincinnati Arts Association, Cincinnati Ballet, Cincinnati Opera, May Festival, Cincinnati Pops Orchestra, and Cincinnati Symphony Orchestra lent their support to an inclusive, arts-focused blood drive at Music Hall in August that collected 100 units of blood and potentially saved 300 lives.

Donors received a free “Love Thy Neighbor” T-shirt and a swag bag of gifts.

Musicians and artists from the Cincinnati Symphony, Pops Orchestra, Cincinnati Opera, and Cincinnati Arts Association performed throughout the day.

Hoxworth is eager to establish additional themed blood drives to encourage more participation in the art of saving lives.

Pay It FORWARD

Blood recipient hosts blood drive after lifesaving transfusions

A full year has passed since Noah Stepaniak was hit by a car in 2019. He wasn't expected to survive a severed iliac artery in two places in his left leg. He spent 26 days in the hospital and had multiple surgeries. He lost his left leg above the knee, suffered kidney damage, a broken arm and injury to his right knee.

The amount of blood loss was significant, but the UC Health medical team and blood transfusions saved his life. The road to recovery was long, but Noah triumphantly returned home and married Kate Reverman.

The generosity of local donors inspired Noah to pay it forward, and he did so by hosting a blood drive.

"Once I was able to grasp everything that was happening and was able to realize all of the amazing people and blood product that was able to save his life, I knew it was now our turn to show our gratitude and help replenish the blood product that was used to save Noah's life, in hopes to save others," says Kate.

"It is an absolute honor to be working with Hoxworth, setting up this successful blood drive, to bring awareness to the fact that blood donation is needed. Donating blood saves lives of the people we love."

"I will forever be grateful to the people who donated their blood so my fiancé could get a second chance at life."

– Kate Reverman



The "Honoring Noah Stepaniak's Survival" blood drive was held in February 2020. The community turned out in a huge way, with appointments booked for a total collection of 74 units, thus saving up to 222 lives.



Lifesaving is a Friends, Family and Co-worker Affair

Loved ones hosted 27 blood drives to honor individuals

A growing trend surrounding blood donation is blossoming in the Tri-State. Friends, family and co-workers are hosting blood drives in honor of a loved one as a way to pay it forward for lifesaving measures received as a patient.

Called patient replacement blood drives, they are named events in honor of recent hospital treatment or the ongoing fight to survive. During the past year, friends and family hosted 27 blood drives in honor of loved ones who had received blood transfusions. These drives collected 1,072 blood products for use at more than 30 partner hospitals, thus saving up to 3,216 lives right here in the Tri-State.

Honorary Blood Drives



Collected 1,072 products

Storm Bratchett Blood Drive	221	Lottie's Love	38
The Judy Morand Memorial	89	Reading Community Giveback	37
Ben Strong Giveback	81	Honoring the Memory of	
Blood Drive for Beth	80	Reco Gunnels, Sr.	28
Cincinnati Children's College Hill	78	Matthew Meyer Blood Drive	27
Honoring Noah Stepaniak's Survival ..	74	Dorothy's Giveback Drive	27
Drew Drew's Warriors	66	Sam Barnhouse Blood Drive	26
Rilee Bostwick Blood Drive	60	Kayleigh Hogan Memorial	
Miracles 4 Matt	56	Blood Drive	25
Gattemeyer Family Give Back	50	Ed Evans Blood Drive	22
Sophia Kappen Blood Drive	44	Julia Gardner Blood Drive	21
Madeleine Ann Luongo	44	Alex strong. Live a rare life.	19
Ferhman Realty Charleigh Strong	43	Andrew Allen	18
Team Chuck	42	Norwood Endoscopy –	
Maya Collins Memorial Blood Drive ...	40	Stephen Cotter	18
		Pray Hope Believe Foundation	16

Specialty Blood Drives

Each year Hoxworth Blood Center hosts a number of specialty blood drives that continue to grow in popularity.

Our community partners host blood drive events that are filled with fun incentives and/or player/VIP appearances.

Donor participation is always high with a measurable outcome of success being the total number of lives impacted by these lifesaving donations.

Top Specialty Blood Drives

Cincinnati Reds	3,228
FC Cincinnati	2,895
Cincinnati Bengals	2,301
Queen City/Cincinnati Cyclones	385
YMCA Drives	300
Library Drives	187
Comic Expo	119



Collected 9,415 products



Get started on hosting a blood drive in your community, visit:
hoxworth.org/host-blood-drive

Research & EDUCATION

Hoxworth is Home to Accredited Transfusion Medicine Fellowship, Offering Career Advancement for Physicians

In the world of blood centers, Hoxworth is unique as it is the only center owned and operated by a college of medicine (versus a university hospital or community blood center). In fact, it is the only blood center in the country located within a large University Medical Center. This unrivaled positioning allows Hoxworth the opportunity to host a Transfusion Medicine Fellowship that is accredited by the Accreditation Council for Graduate Medical Education (ACGME).

The Fellowship at Hoxworth Blood Center, second oldest blood center in the country, offers physicians career development training, enabling them to assume leadership positions as directors/medical directors of regional or community blood centers or hospital transfusion services.

Most recently our Fellows have accepted positions as Medical Director of Kentucky Blood Center, Lexington, Ky., VP of Medical Services at Life South Community Blood Centers, Gainesville, Fla., Director of Transfusion Medicine and Laboratory Informatics at Phoenix Children's, Phoenix, Ariz., and Director of Transfusion Services/Assistant Professor OU Medical Center, Tulsa, Okla.

The program provides faculty representing one or more special interests within the field of Transfusion Medicine. Active faculty research interests include platelet hemostasis, optimization of blood component storage, pathogen reduction of blood products, hematopoietic stem cell biology in health and disease, transplantation immunology, immunohematology and microenvironment control of hematopoiesis.

Hoxworth Blood Center distributes more than 300,000 blood components annually. The trainees take call at University Hospital and Cincinnati Children's Hospital Medical Center. Because of this, unique opportunities exist to participate in the evaluation and resolution of clinical problems associated with an active level I trauma center and transplantation center for liver, kidney and stem cells. Transfusion support for neonatal and oncology patients provides an additional facet to the fellows' education.

Hoxworth also trains residents and fellows as specialists in blood banking technology as part of a master's program.

Hoxworth Research Pioneers Paved the Way for Advances in Transfusion Medicine

Since Hoxworth's founding in 1938, research has taken center stage and paved the way for advances in transfusion medicine. From Hoxworth's first director, Paul I. Hoxworth, MD, to his successor Tibor Greenwalt, MD, the world of blood banking has transformed into the field of transfusion medicine. Greenwalt initiated a dedicated research division in 1979, and Hoxworth's current director, José Cancelas, MD, PhD, continues to foster this momentum.

The goal of the Research Division is to link basic research with clinical care, leading to improved methods that ensure the quality, safety and efficacy of the blood and hematopoietic cell supply. The research program includes clinical research, basic biological research, and translational research.

Noteworthy Research

Most recently, the Hoxworth research team published a collaborative study with the Weizmann Institute of Science in Israel. The paper is featured as the cover article for *Blood* (a publication of the *American Society of Hematology*) and focuses on the fate of hematopoietic stem and progenitor cells as they are tightly regulated by their bone marrow micro-environment.

The Hoxworth research team, led by Dr. José Cancelas, MD, PhD, also includes; Ramesh Nayak, PhD; Shailaja Hegde, PhD; Abhishek Singh, PhD; Haixia Niu, PhD; Neeta Rugg, MS; Shawnagay Nestheide; Ashley Wellendorf; Breanna Bohan; Monroe Conner; Margaret O'Leary; Sophie Harrington; and Bernadette Bennison.

Research Focus

- hematopoietic stem cell biology
- myelopoiesis and innate immunity biology in health, stress, and disease
- cellular and molecular regulation of hematopoietic signaling in physiology and pathology, including microenvironment signaling
- pre-clinical and clinical development of novel therapies to increase efficacy and safety of blood progenitors and cells



Clinical lab scientist Brian Vencl prepares to calibrate a robot used for HLA antibody studies. Implementing this technology has significantly reduced testing variability.

Hoxworth Laboratories Identify and Secure Rare Blood Types Needed By Local Patients

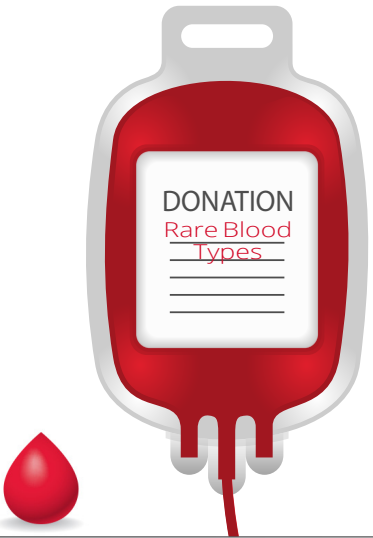
When an individual has a rare blood type outside of the O, A, B, AB norm, Hoxworth Blood Center lab technicians go to work to identify and secure the needed blood products.

Such a case arose when a partner hospital discovered an abnormality in a pregnant patient. Hoxworth's Immunohematology Reference Laboratory (IRL) was called into action and identified the patient to be H deficient.

The H deficiency, known as the Bombay phenotype (hh), is a specific blood group that was first discovered in Mumbai (then Bombay) in 1952. Not only is this specific blood group rare in India, Bangladesh, Pakistan and parts of the Middle East such as Iran, but it is also even more rare globally. People who have this rare blood type can only receive blood from other donors who are also H deficient.

The Hoxworth IRL team was able to locate and secure a frozen unit of Bombay (hh) to keep on hand should the patient require a transfusion. Fortunately, the pregnancy was uncomplicated and the transfusion was not needed – thus the frozen blood remains available for other patients who may need this rare type.

Lifesaving Impact



Bombay Blood Group

is among the rarest types of blood. Only four per million of the world's population have this blood group.



Hoxworth Labs:

Providing Quality Services for Hospital Customers within and Beyond its 18-County Service Area

Dr. Caroline Alquist, PhD, a Cincinnati native who graduated from Ursuline Academy in Blue Ash, stepped into a new role to lead Hoxworth's Transplantation Immunology Division (TID).

Alquist, who came to Hoxworth from Ochsner Health Systems in New Orleans, now oversees a state-of-the-art histocompatibility and immunogenetics testing laboratory that includes 16 employees with more than 200 combined years of HLA testing experience.

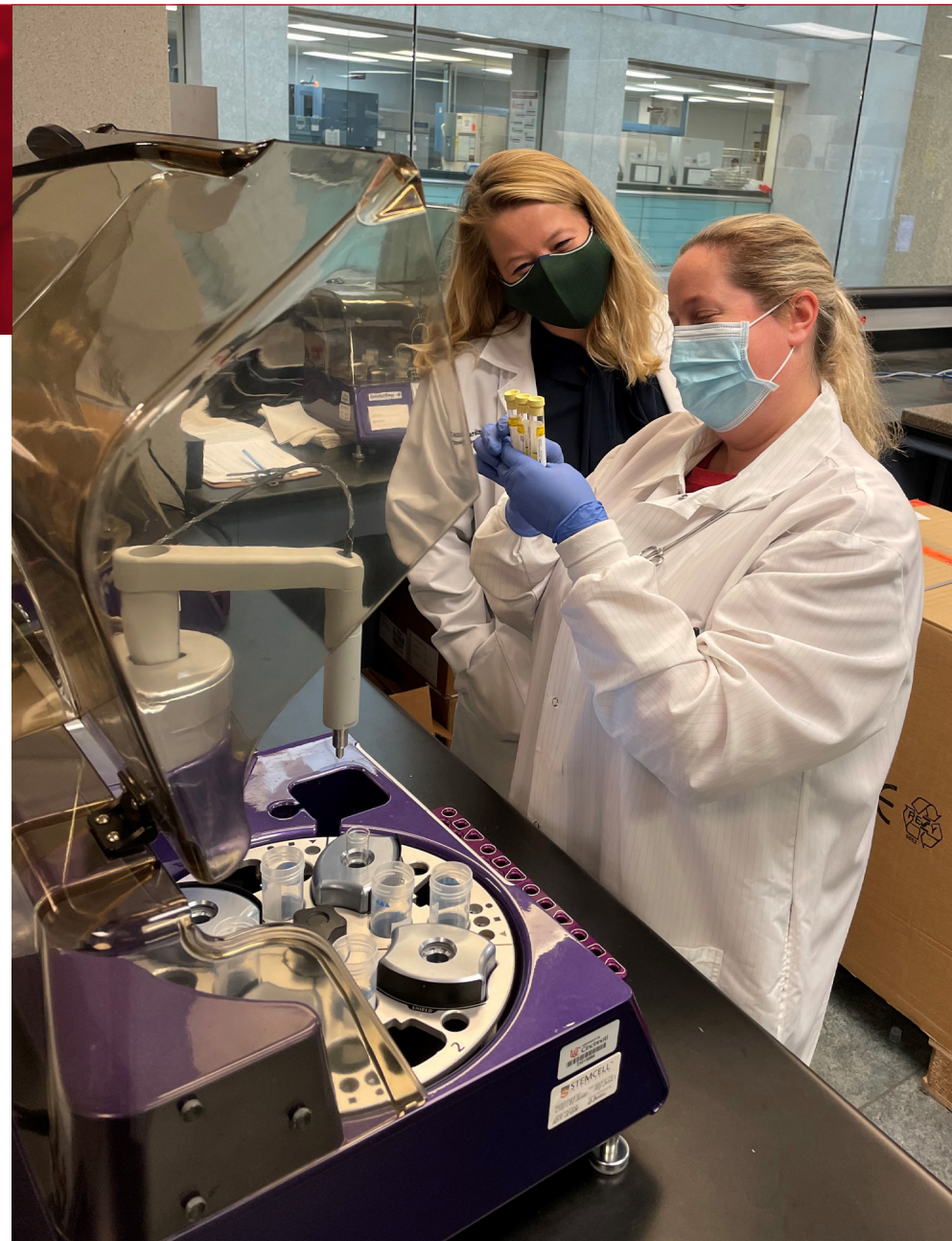


Caroline Alquist, MD, PhD

The TID provides testing and consulting services for solid-organ and hematopoietic stem cell transplant programs throughout greater Cincinnati. The TID also assists physicians and hospitals with immune monitoring, clinical trials, and disease diagnoses.

During the past year, the TID has supported more than 1,500 patients after bone marrow, liver, heart, lung, kidney, pancreas, and small bowel transplants. All of this has been completed in collaboration with 12 distinct hospitals and two organ procurement operations, LifeCenter and Life Connections.

The TID now provides buccal swab testing to avoid unnecessary needle sticks for potential bone marrow and living kidney donor workups. Additionally, with the onset of the COVID19 pandemic, TID has antibody tested more than 900 units of convalescent plasma used to treat those severely ill with the virus.



1,500 patients were supported by Hoxworth's Transplantation Immunology Division in 2019-2020, after bone marrow, liver, heart, lung, kidney, pancreas, and small bowel transplants.

Photo: Dr. Caroline Alquist, director of Hoxworth's Transplantation Immunology Division, works with clinical lab scientist Ryanne Ross to review patient labels prior to automated cell separation.

Hoxworth Labs:

When Patients Need a Bone Marrow or Stem Cell Transplant, Partner Hospitals Turn to Hoxworth's Cellular Therapy Laboratory for Support

Evan Perricelli had just graduated from kindergarten when he was diagnosed with Aplastic Anemia.

Aplastic Anemia is a rare blood disease in which damaged bone marrow and blood stem cells prohibit the body from producing new blood cells, resulting in low levels of red blood cells, white blood cells, and platelets.

In cases like Evan's, the best hope for a cure is a bone marrow transplant, which is dangerous and often challenging to perform because of the difficulty in finding a suitable match from a donor. Fortunately, Evan's brother, Lucas, was a match and less than two months after his diagnosis, Evan received his bone marrow transplant at Cincinnati Children's Hospital Medical Center.

Hoxworth's Cellular Therapy Laboratory assists patients like Evan by providing comprehensive laboratory support for bone marrow and stem cell transplant patients at UC Health, Cincinnati Children's Hospital Medical Center, Jewish Hospital, and Akron Children's Hospital, as well as for the National Marrow Donor Program.

For allogeneic transplants, a related or HLA-matched healthy volunteer donates either bone marrow or peripheral blood apheresis product cells for a



Evan Perricelli, now age 13, is thriving after a lifesaving bone marrow transplant.

patient. Umbilical cord blood products are used less frequently. This laboratory performs a variety of manipulations on these products, depending upon the source and volume of stem cells received and the diagnosis of the recipient.

Today, Evan is healthy teenager and has a true warrior spirit, says his mother, Lisa. The family is thankful for blood and platelet donors, as well as those who worked to make his bone marrow transfusion possible.



Lab assistant Lindsey Lyons performs a manual task of separating plasma from red cells.

The Components Laboratory at Hoxworth is among the busiest, operating 24 hours a day, seven days a week for 365 days a year, even in the midst of the COVID-19 pandemic.

The round the clock schedule better serves our Tri-State hospital partners that, in turn, means meeting the needs of area patients.

Hoxworth Blood Center is licensed by the Food and Drug Administration (FDA) and processes whole blood, red blood cells, plasma, and apheresis platelet donations that are further separated into blood components.

The bottom line for these essential lab workers is that they ensure blood products are safe and readily available for any sort of traumas or emergency surgeries that would require massive amounts of blood products.



Livi Werne



Alex Heekin

Hoxworth Volunteers: The He♥rt of Our Team

Our volunteers help Hoxworth in a variety of ways. They help at blood drives and perform donor-related tasks as greeters, or they assist in our neighborhood donor centers by helping out in the Lifesaver Café and some serve as couriers, transporting those lifesaving blood products to the lab to ensure blood is on the shelf when needed. No matter the task at hand, **our volunteers are AMAZING!**

Livi Werne

She's not quite old enough to donate blood, but she shines as a Hoxworth volunteer

At nine-years-old, Alivia Werne (who goes by Livi) is one of Hoxworth's youngest volunteers.

One day while accompanying her mom Krista to donate blood, she noticed the Café area, where donors can relax and recharge post donation, was noticeably quiet. A sign asking for volunteers prompted Livi to step up. She now volunteers once a month to run the Café area at the Blue Ash location, making popcorn and baking cookies for blood donors.

Mom Krista is a longtime blood donor, a giving act she learned from her father, so watching her daughter Livi get involved has been meaningful.

Krista's father had lung cancer, and platelets gave them more time together. "This is why we're here and promoting how important it is," Krista says.

Livi doesn't remember her grandfather, but she agrees that it's special to be a part of Hoxworth's lifesaving work.

She says that she might be a donor once she's old enough, but for now, her favorite part about volunteering is "getting to talk to the people, and hearing interesting stories from the donors."

"I'm very proud that my daughter is so eager to give back," Krista says. "Lifesaving runs in the family. It doesn't cost us anything to help."

“Lifesaving runs in the family. It doesn't cost us anything to help.”

– Mom Krista Werne, donor and volunteer



Alex Heekin

She's not a Hoxworth employee, but her impact on the blood center is enormous

Alex Heekin is a Cincinnati native who has been donating since 2004. As an employee of the UC Health Barrett Cancer Center, she knows the importance of donating her precious O- type blood as many cancer patients, including her own family, need transfusions during treatment.

Beyond donating, Alex has taken her commitment to Hoxworth's mission a step further by becoming a volunteer in 2019. Not only that, she helped Hoxworth

at a difficult time, during the peak of the COVID-19 pandemic.

Alex volunteers as a driver for the blood center, responsible for picking up blood products from drives and donor centers and bringing them back to Hoxworth's labs. She found the experience to be immediately rewarding; and Hoxworth found her to be instantly helpful. "I am so grateful for all the people who donated the blood products my family received, and this is the best way I know to thank them," she says.

Hoxworth

BLOOD CENTER

UNIVERSITY OF CINCINNATI 

3130 Highland Avenue, 4th Floor
Cincinnati, OH 45267
(513) 451-0910



hoxworth.org



OUR DONORS Save Lives

30,263 donors came through the doors of Hoxworth's seven neighborhood donor centers between July 2019 and June 2020.

They, along with blood drive hosts and participants, are critical components to Hoxworth's success.

The need for donors never ends. Please consider donating blood at your local Hoxworth Neighborhood Donor Center or area blood drive. Appointments can be scheduled by calling (513) 451-0910 or visit us on the web at hoxworth.org.

WAYS TO MAKE AN IMPACT IN YOUR COMMUNITY

- ✓ Commit to saving lives by making a blood donation
- ✓ Volunteer to assist in our lifesaving mission
- ✓ Host a blood drive and save countless lives
- ✓ Make a financial donation to help fund a new lifesaving bloodmobile

LEARN MORE AT HOXWORTH.ORG

