Wavelength
DEPARTMENT OF SPEECH AND HEARING SCIENCES NEWS | FALL 2022
LET US KNOW ABOUT YOUR LIFE AFTER WSU

We enjoy hearing from our alumni and friends. Please continue to let us know about your life after WSU. With your permission, we will include news of your professional and personal journeys in our next issue of Wavelength. Please stay in touch by e-mailing Amy Meredith at mereditha@wsu.edu.
Warm greetings from the Department of Speech and Hearing Sciences (SHS). This has been and will continue to be a time of change and innovation for the department. On July 1, 2021, Gail Chermak, PhD, stepped down as department chair after more than 30 years of service in that capacity. I was elected by my colleagues and appointed by the dean to serve as the new chair of SHS.

A little about me: I am a graduate of the University of New Hampshire (BS ’89), the University of Arizona (MS ’93), and the University of Washington (PhD ’00). I came to WSU in 2006 from the University of Minnesota Duluth where I was a professor. I took on the roles of graduate director for SHS in 2015 and interim department chair in 2021 before becoming department chair in 2022. The primary focus of my research and clinical expertise is on childhood apraxia of speech with a secondary focus on cleph related speech disorders. To this effort, I recently co-authored a resource book, Here’s How to Treat Childhood Apraxia of Speech, 3rd edition, with Margaret (Dee) Fish.

Exciting developments during the 2022–2023 academic year include the initial development of an Autism and Neurodevelopmental Center of Excellence. The center will offer diagnostic services and treatment for children with autism and other neurodevelopmental disorders and opportunities for interprofessional practice, research, and education. We are excited to be part of the solution to the long wait times individuals endure to obtain accurate diagnoses and subsequent treatment.

We also began working with the WSU Tri-Cities, Vancouver and Global campuses to expand our program and increase access to students unable to move to Spokane. Presently, smaller cities and rural areas in Washington struggle to find adequate numbers of SLPs to train students and treat patients. As a land-grant university, we are working hard to address this issue and look forward to providing updates in the months to come.

In January 2023, we will welcome our newest faculty member, Katy Cabbage, PhD, who is joining us from Brigham Young University. Cabbage is an alum of our University Programs in Communication Disorders. Her primary research, teaching, and clinical interests are speech and language disorders in children.

One of the biggest upcoming departmental changes will take place on July 1, 2023, when we will discontinue our cooperative program with Eastern Washington University, which has educated students in the field of Speech-Language Pathology for many years. This amiable separation will enable both university programs to pursue new opportunities and better meet the increasing need for speech-language pathologists across Washington.

We are grateful for the founding faculty, students, alumni, community members and others who have made UPCD successful. Although we will be operating as separate entities, we look forward to future collaborative endeavors.

All the very best,

Amy Meredith, PhD, CCC-SLP
Chair and Professor
TRAVELING A NON-TRADITIONAL PATH TO BECOMING AN SLP

Victoria Franklin, MS, CC-SLP (BA’11, MS’20)

The summer before my senior year at WSU I got married.

I didn’t tell my professors or my classmates. In fact, they found out when Amy Meredith, PhD, took attendance and used my new legal name. Everyone had questions.

At that time, it was hard to explain that this life-changing decision to get married so young was influenced by love, the United States Marine Corps (my betrothed’s employer), and my family’s very strict traditions. A lot of people worried about me. Close friends and mentors hoped I had made the right decision and that I wasn’t going to put off and forget my career goals.

I told everyone not to worry and that I was just going to put graduate school off for a year. “I got this!” I told myself as I received my bachelor’s in Speech and Hearing Sciences in 2011.

Little did I know the journey that lay ahead of me.

Unfortunately, that year turned into seven years. During that time, I went through every emotion trying to get back to graduate school. I felt the angst of rejection letters, waitlists, odd jobs, new career options and, finally, the joy of being accepted into a program.

First stop: Quantico, Va.
I chose to put graduate school off for the next year while I made the move from Washington to the east coast.

Second stop: Pensacola, Fla.
I started studying for the GRE and applying to graduate programs. I was rejected from one program and waitlisted at another. I felt terrible. This blow to my confidence led me down a road of odd jobs, including a private tutor and a bank teller over the span of two years.

Third stop: San Diego, Calif.
Due to a six-month duty station for my husband, I couldn’t get back to school or work, so I settled for spending lots of time with family and friends. I cherished this time greatly, but I was itching to get back in the classroom. I kept thinking that maybe I would really like being a nurse. Yikes!

Fourth Stop: Oahu, Hawaii
The beach, sand, sun and incredible weather distracted me from my graduate school woes. I was convinced that maybe this was it for me. I was in paradise. This feeling lasted for some time. I even took some prerequisite courses and began applying to a nursing program, but it just didn’t feel right. I had to admit that I was not cut out to be a nurse.

The racial and political climate across the country threw me into a whirlwind of emotions. I found myself reflecting on communication as a human right, my personal journey through the immigration system, and the skills I had to offer to the field of speech-language pathology.

It wouldn’t take long for me to call up one of my WSU professors and ask if I could join her on her next venture to Guatemala where she provided speech-language therapy consultations to families living in remote areas. I had gone with her as an undergraduate student and had the opportunity to translate for families experiencing complex communication needs.

A week is all it took for me to realize I still had it in me. I wanted to be a speech-language pathologist more than anything. My drive and motivation led me to apply to the University of Hawai‘i at Mānoa within a year of that trip.

Of course, in a dash of suspense, the UH Communication Sciences and
Disorders department placed me on their waitlist for about three months. Lucky for me, I made it off the waitlist and I completed my program in summer 2020 during the pandemic.

**Fifth Stop: Educational Service District 113**

Returning to Washington was always the goal for my husband and me. Now that I had my degree and we were ready to move back, I set off to find a placement that would allow me to work in schools, specifically those with the greatest needs. Growing up in Tonasket, Wash., I knew that quality services were difficult to come by in rural areas, so I didn’t shy away from looking at smaller school districts.

It was not long before I was connected to educational service districts (ESDs). ESDs are essential for helping smaller school districts access quality care and can be found throughout the state. I quickly sent ESD 113 my resume and within a few days was interviewed via Zoom and offered a position. I could not have joined a more incredible team of occupational therapists, school psychologists and fellow SLPs.

It is hard to believe but I am about to complete my second year as a school-based SLP. The seven-year gap between my undergraduate education at WSU and graduate school was full of every emotion imaginable. It may not be a traditional path, but it can be traveled. If you have been thinking about going back to graduate school, lean into it and you just might surprise yourself.

Go Cougs!
The best age to start speech and language intervention

Think of a conversation that made you say, “That gives me a good idea.” Often innovation is born from conversations.

Nearly 10 years ago, my friend and colleague Beate Peter, PhD, CCC-SLP, now at Arizona State University, asked me, “Do you think it would be possible to prevent, or at least minimize, speech and language disorders if we started early enough?” Our conversation led to our latest research initiative, Babble Boot Camp (BBC).

The National Institutes of Health decided the question was worth funding, so we are underway with a clinical trial looking at starting speech therapy shortly after birth with children who have an identified risk for speech or language disorders. Research is rather like conversation: we ask questions, we respond, and we seek answers. In this brief article, I ask you to join our research conversation through a series of questions and responses.

How would you answer the question, “What is the best age to start speech and language intervention?”

In 1970, only one in five students with a disability were educated in U.S. public schools. A major educational shift occurred when Congress enacted a law later known as the Individuals with Disabilities Education Act in 1975, with significant revisions and reauthorizations in 1990 and 2004.

This new law was responsible for my first SLP job 45 years ago—a grant-funded study in Minneapolis and St. Paul, Minn. examining if at-risk children made noticeable speech and language gains when speech therapy was initiated before kindergarten. Armed with a new bachelor’s degree in speech pathology, I started an intervention program for 3-year-old children who had speech and language disorders. They did indeed make progress.

Were outcomes better for children when we intervened at 3 years of age rather than waiting until kindergarten?

The short answer is a resounding “yes.” With increased funding, school districts and county programs scrambled to start early intervention (birth to 3 years) and early childhood programs (3-5 years).

Where are we today?

Most children needing speech therapy start services when they begin to fall behind their peers, usually around 2 or 3 years of age.

Why are we waiting until an at-risk baby becomes a toddler before sending in reinforcements to prevent them from falling further behind and attempt to catch them up with their peers?

Early intervention programs, often on a weekly or monthly schedule, are available for babies or toddlers who qualify, however, evidence-based treatment approaches for this age group are limited. With advancements in newborn screening, both hearing and genetic risks are assessed in the baby’s first 24 hours, so we often know shortly after birth that a child is at-risk for a speech/language disorder.

How did you choose a population to start BBC with?

Babies with classic galactosemia (CG) became our first BBC population. Detected in the newborn heel test, classic galactosemia is a recessive inherited in which both parents carry one copy of the CG gene, and metabolic disorder, meaning individuals have difficulty processing or getting energy from a specific food. Individuals with CG cannot
process galactose, one of the sugars present in all human and animal milk and milk products. Drinking breastmilk, typical formula, cow’s or goat’s milk will cause severe illness and death in babies with CG.

The present treatment for this disorder is to remove all milk from a baby’s diet and substitute a soy-based formula or an elemental formula like Nutramigen. Even with a diet restriction, however, individuals with CG have a 50-80% chance of having speech, language, and motor disorders, including a 180 times greater risk of childhood apraxia (CAS). I have researched and worked with children and adults who have CG for the past 17 years. This high prevalence of speech, language and motor disorders coupled with a diagnosis at birth made CG a prime initial population for piloting BBC.

What do you do with tiny babies when they are not talking yet?

Babies may not be talking, but they are communicating. In BBC, we joke that we wait until the umbilical cord falls off before we start speech therapy. When we wanted to develop an evidence-based treatment approach, I called Jenny Davis, a graduate of the collaborative WSU-EWU UPCD program. We affectionately call Jenny “the baby whisperer.” Currently, Jenny conducts all the BBC speech therapy sessions through 15-minute, weekly telepractice meetings with families who have a baby with CG.

Before each session, parents send several short videos showing what the baby is currently doing. Jenny watches the videos in advance of the session and then can sit down with the parents to discuss the amazing things the baby is doing, the next steps, and two to three things parents can do during the upcoming week to encourage the baby to progress in one of the target areas. This approach builds on what the baby knows, also known as the Zone of Proximal Development. Target areas include eye contact, vocalizations, babbling, labeling, modeling, recasting and expanding.

Well BBC sounds very nice, but does it work?

Preliminary results indicate that the speech and language outcomes are best when speech therapy is initiated as early as possible. Babbling complexity was higher in children with CG treated in BBC compared to untreated children with CG and the typically developing controls.

Follow-up data at age 2 ½ years showed that 12 out of 12 treated children with CG had typical language development and 11 of 12 had typical articulation scores. Seventy children are currently enrolled in BBC.

What other populations might BBC be appropriate for?

A surprising number of disorders associated with speech/language delays and disorders are now identified at birth or shortly after birth. We currently are piloting BBC with babies who have Down syndrome, were premature, or have a strong family history of CAS.

How do I get BBC-trained?

The BBC research assistants are presently working on SLP training materials. Naturally, the SLP training will be delivered online for this online treatment approach. We will update you on where and when the training is available.
HEALTH SCIENCES EDUCATIONAL OUTREACH

Health Sciences Educational Outreach (HSEO), a registered student organization at WSU Spokane, is focused on educating culturally diverse populations on the different careers in health care, particularly those in speech and hearing sciences. We meet monthly to identify ways to educate students in our community about the field of speech-language pathology and audiology.

During the 2021–2022 academic year, we offered a mix of virtual and in-person events. To expand our outreach throughout the campus and community to reach a broad and culturally diverse population of students, we began the year collaborating with the Native American Health Science (NAHS) program.

Our first event with the NAHS program was the Na-ha-shnee STEAM Health Summer Institute. In the summer of 2021, we mailed materials for students to complete at home while we interacted with them on Zoom. During this event, we presented an overview of the careers of speech-language pathology and audiology and taught the students about swallowing disorders using thickened liquid. The students, who spanned grades nine through 12 and represented 21 different tribes from the west, southwest and midwest, were enthusiastic to be a part of a learning opportunity that set the stage for a successful year.

In partnership with other professional programs at WSU Spokane, we visited middle schools in Stevens County several times throughout the year to educate students about the different types of patients we treat and possible career paths. At one of the events, Speech and Hearing Sciences students set up an Augmentative & Alternative Communication activity using a paper communication board. The middle school students then used the board to communicate without speaking and competed to see who could create the longest sentence.

We hosted a booth at the Spokane Valley Bike Swap in June 2021 and April 2022 to educate community members about the program. Using a skeleton on a bike with its helmet worn incorrectly, individuals identified the safety concerns that could lead to possible traumatic brain injury (TBI). We gave...
Out candy Airheads with a sign stating, “Don’t be an airhead, wear a helmet!” and talked about how speech-language pathologists engage with individuals diagnosed with TBI. Community members shared their personal experiences with TBI and their perspectives on protective headgear.

And, as an annual HSEO tradition, we attended a virtual event for students who participated in the Washington HOSA Statewide Conference. HSEO members spoke on behalf of speech-language pathologists and audiologists to inform students how we have played a vital role throughout the pandemic.

We are proud to celebrate four years of HSEO advocating for diversity in health science careers. Thank you to our club officers, faculty advisor, club members and community partners for a successful year.

2021–2022

Health Sciences Educational Outreach Officers:
Maya Ladner, President
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Isabella Faccone, WSU Treasurer
Emily Driskel, EWU Treasurer
Kaylin Sheley, Secretary
Sydney Steffan, Public Relations
Ashlyn Yamane, EWU Representative

Advisors:
Amy Meredith, PhD, CCC-SLP, Faculty Advisor
Camron Valdez, Junior Liaison
Rebecca George, Post-Bacc Liaison
NOTES FROM NSSLHA

The National Student Speech, Language, and Hearing Association (NSSLHA) continued its long-standing tradition of inspiring, empowering and supporting students in communication sciences and disorders.

Fundraising

We held two fundraisers this year to support the speech and hearing community. The first was a fall fundraiser with Chipotle to raise money for the National NSSLHA’s scholarship fund, which provides scholarships to students in the field of communication disorders across the country. Our chapter raised more than $180 for student clinicians. The second was a spring fundraiser selling sweatshirts that raised more than $250 in support of HOPE Spokane, which provides education to deaf and hard-of-hearing children. Thank you to our fellow students, faculty and community members for helping us raise these funds.

Philanthropy

Our NSSLHA chapter members volunteered at the annual Steps of Autism walk in April and supported local non-profit Jewel’s Helping Hands by hosting a winter supply drive on campus. We also donated warm clothing and hygiene products to Spokane community members in need and handmade more than 70 Valentine’s Day cards for the Corbin Senior Center.

Education

We kicked off the school year with an in-person event featuring WSU graduate Brian Shute, PhD, who shared his educational journey to becoming an SLP and the many roles he has held in his career. He also gave us some unique educational insight by demonstrating an artificial larynx and the importance of the device for some hospitalized patients. With our faculty advisors, we also held virtual events on WSU and EWU graduate programs and application processes and a panel event with current first-year SLP and AuD graduate students at several universities. These events provided insight into the first year of graduate school and what to anticipate during the transition out of undergraduate education.

2021–2022

NSSLHA Officers:
Aimee Joiner, President
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Audelia Arredondo, EWU Treasurer
Sheridyn Youngblood, WSU Treasurer
Kendall Fink, Secretary
Claire Schrock, Public Relations

Faculty Advisors:
Lindsay Williams
Dana Algeo-Nichols, PhD, CCC-SLP
Professor develops groundbreaking autism screening tool, takes next steps toward FDA approval

With autism now identified in one in 44 children in the U.S. according to the Centers for Disease Control and Prevention, the need for accessible and accurate diagnostic tools and early intervention has never been greater. For Assistant Professor Georgina Lynch, PhD, that need is the driving force behind her development of a state-of-the-art technology that could revolutionize autism screening.

“Everyone wants to be part of the solution and help us advance this work so we can serve the people who it will impact the most. It’s a great example of how research collaboration can meet the needs of our community,” said Lynch.

Autism spectrum disorder (ASD) is a neurological and developmental disorder that impacts an individual’s ability to communicate, learn, behave, and interact with others. Her solution is a handheld technology that can quickly, noninvasively, and objectively screen ASD in children as young as two years old.

“Our aim is to significantly bolster ASD screening with a tool that is easy for health care professionals to use and ensures results are specific and accurate, giving providers the confidence to take the next steps toward full diagnosis of a child,” said Lynch.

Since 2020, Lynch has conducted rigorous preliminary studies and tests of the technology funded by a $50,000 phase one grant by the Washington Research Foundation. Early results showed the technology produced reliable, objective screening data that was sensitive enough to detect ASD across all areas of the spectrum.

As a result of this early success, the Washington Research Foundation awarded an additional $95,000 grant in June to support phase two of development. This will support continued partnerships with Seattle Children’s Research Institute and Spokane-based Northwest Autism Center, as well as the Autism and Developmental Medicine Institute at Geisinger Health in Pennsylvania, so Lynch can expand her testing.

If all goes according to plan, Lynch anticipates she will secure enough second phase data this year to apply for FDA pre-market approval in 2023 and take the technology to market in 2024—a rapid timeline that she attributes to the college’s community-based model and the close connections it has forged in a short time.
Over the past dozen years, Speech and Hearing Sciences graduate students have been using simulation to learn and practice specific skills for the assessment and treatment of dysphagia. This year, we expanded our simulation experiences by introducing new learning experiences in the college’s Virtual Clinic Center.

Built to expand upon existing coursework on voice disorders and motor speech disorders, students were introduced to a variety of simulation experiences and learning modes.

In an introductory activity, students interacted with a lifelike manikin and played several roles, including a speech-language pathologist, a family member, and a patient, to practice communication, assessment and real-world scenarios.

As students progressed through their curriculum, they performed a clinical swallow exam and therapy with standardized patients who portrayed voice and motor speech disorders including vocal nodules, hyperkinetic dysarthria (Parkinson’s Disease) and Dystonia and conditions such as a stroke, cerebral palsy, or Amyotrophic lateral sclerosis (ALS).

The updated simulation curriculum introduced students to a new environment for skills-based instruction and allowed students to experience the pressures and nuances of caring for patients. Students also found the standardized patient encounters helped them develop humanistic and clinical reasoning skills.

Kadie Langford, a graduate student in the program, noted, “While we learn a lot in the classroom, having the ability to apply our skills with simulated patients in a clinical environment truly expands our professional learning.”
For first year master’s student Catherine Baxter, a scholarship is paving the way for her to gain experience and valuable connections in her field of study.

Instead of taking an unrelated job to pay the bills, a scholarship awarded by the Scottish Rite Foundation of Washington is providing Catherine with a paid work-study position at the Early Life Speech & Language Clinic in Spokane.

“Receiving that stipend is huge,” said Baxter. “It allows me to pay attention to my classes and take care of myself.”

The experience is not only providing important insight into how a clinic runs and patient protocols, it’s also creating critical connections to speech-language professionals and other relationships that could lead to future placements.

“Enjoying work at the clinic, and they’ve become mentors,” said Baxter. “They work with populations from ages 0 to 7 and it’s really exciting to see their work in pediatrics.”

Though Catherine is still exploring the exact populations she plans to work with when she graduates in 2024, the experiences at the clinic have furthered her interest in specializing in pediatric clients and allowed her to gain important exposure during her time as a student.

“I’m getting a lot of experiences rather than focusing on supporting myself financially,” she said. “This scholarship has given me the opportunity to explore my passions without worrying about financial responsibilities.”

“While this scholarship has given me the opportunity to explore my passions without worrying about financial responsibilities.”

— Catherine Baxter
SHS student

Please consider a gift to the Speech and Hearing Sciences Excellence Fund by visiting medicine.wsu.edu/give.
SPOTLIGHT ON STUDENTS

Academic and Clinical Excellence

Victoria Heinlen is developing an online training program for early intervention SLPs expected to be live in 2023.

Claire Schrock is coordinating follow-up assessments for the NIH-funded Babble Boot Camp study.

Marissa Wichers is co-leading an online support group for adults with dystonia with Professor Nancy Potter, PhD, CCC-SLP.

Tanya Rivera received the 2022 WSU Emiritus Society Undergraduate Research Grant and the 2021-22 National Student Speech-Language Pathology Scholarship, NSSLHA.

Alex Bredy presented research at ASHA and the Washington State Speech-Language Hearing Association Board of Directors.

Service and Outreach

Audrianna Heffernan is co-leading a local chapter of the National Stuttering Association (NSA), a support and advocacy group for people who stutter with Assistant Professor David Jenson, PhD. She is also coordinating with local community partners to plant a youth-focused NSA chapter.
The Multicultural Club is a student-run organization comprised of future health science professionals who promote cultural awareness and explore how culture fits into healthcare professions. Our overall goal is to promote advocacy, diversity, equity and inclusion. Founded on the importance of cultural competence and education, we believe that being culturally competent is a continuing process that takes constant effort and education.

We began this academic year by partnering with World Relief to support the Afghanistan refugee crisis. Our members collected monetary and personal hygiene product donations to make care packages for the millions of displaced refugees, including Afghanistan refugees residing in Spokane.

The club also started a new educational guest series focused on health professionals of differing backgrounds, races and ethnicities. We began the series with guest speaker Biancha Diaz, MS CCC-SLP, a bilingual, Latina SLP who spoke on the importance of cultural competency to speech-language pathology. Diaz said being bilingual gives her the ability to better advocate for children of different ethnicities and races and emphasized that we must find cultural competency outside of higher education to make us better future clinicians.

Our other guest speakers included Tammy Le, a first-generation, Vietnamese American graduate student at Northwestern University, who shared how she promoted diversity and inclusion in her master’s program and how we can make a difference no matter where we are in our educational journey. We also heard from Alexandria Lewis, a teacher for the Deaf and hard of hearing at HOPE School in Spokane, who provided insight into the world of someone with hearing loss and how their education is successfully facilitated.

Our club also sponsored many cultural events around our community including collaborations with the Native American Health Sciences Club and the Spokane Diversity Center. Thank you to the faculty, members and organizations who supported us throughout this year.

**2021–2022**

**Multicultural Club Officers:**
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Ashley Drewry, Secretary
Sheridyn Youngblood, WSU Treasurer
Mya Elder-Hammond, EWU Treasurer

**Faculty Advisors:**
Clinical Professor Amy Meredith
SPEECH AND HEARING SCIENCES

Preparing speech-language pathologists to provide compassionate, patient-centered care