

Sarah Biber, PhD, NACC Executive Director Monday, May 6, 2024 ADRC Spring Meeting





#### **NACC's 25th Anniversary!**



National Alzheimer's Coordinating Center

ANNIVERS PAR

UDS Impact



**50,000+** Participants with UDS data (18,000+ active participants)



188,000+ Clinical assessments (1-19 visits per participant; median =3)



**7,900+** Neuropathology datasets (From 58% of deceased participants)



1,300+ Published studies using NACC data



**37** ADRCs are contributing data (Across 26 states)





**71,000+** Participants with MDS data



**11,000+** Neuropathology datasets





#### Special Issue of the Journal of Alzheimer's and Dementia

Celebrating
the ADRC
Program's
40th and
NACC's 25th
Anniversary

Call for proposals can be viewed at:

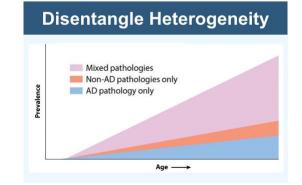
bit.ly/NACC Special Issue

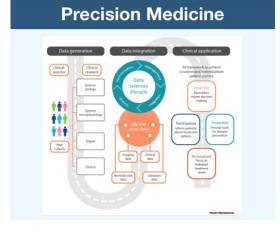
Submission Deadline: December 31, 2024

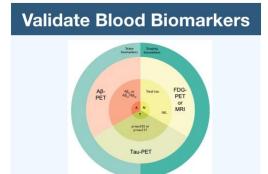
GOAL: Highlight the impact these programs have had on advancing ADRD translation and discovery and their ongoing and critical role in tackling the most pressing challenges in the field

# Cognition Cognition Preclinical AD Clinical Impairment Accumulating AD pathology Years

















# 2.5 YEARS

**NACC** is rapidly evolving and leveraging its' unique strengths to meet the emergent needs of the ADRD field and the **ADRC Program** 

#### **NACC's Expanded Mission and Role**

Data Coordination & Centralized Repository

Findable Accessible Accessible Accessible Accessible Reusable











## UDSv4: Establishing new data standards for the field





#### Launching UDSv4

#### **Defining New Standards for the Field**



#### **ADRD-Disease Modifying Drugs**

Form A4a: ADRD-Specific Treatments



#### **Social Determinants of Health**

A1a: Social Determinants of Health



#### **New Concepts**

- Subjective Cognitive Decline
- Mild Behavioral Impairment
- · Addition of the new verbal learning test

#### **More Inclusive**

- More inclusive gender and sexual orientation questions
- Captures multi-racial identity





#### Completed UDSv4 Content, PDFs, and REDCap Forms

#### 100% UDSv4 content complete!

#### **Approved by CTF**

- Form A1
- Form A1a: SDOH
- Form A2
- Form A3
- Form A4
- Form A4a: ADRD-Specific Drugs
- Form A5/D2

- Form B1
- Form B3: UPDRS
- \*Form B4
- \*Form B5
- \*Form B6
- \*Form B7
- Form B8
- Form B9

- Form D1a
- Form D1b
- Form C2/C2t

#### **New forms**

\*No changes from UDSv3



100% of UDSv4 REDCap forms developed

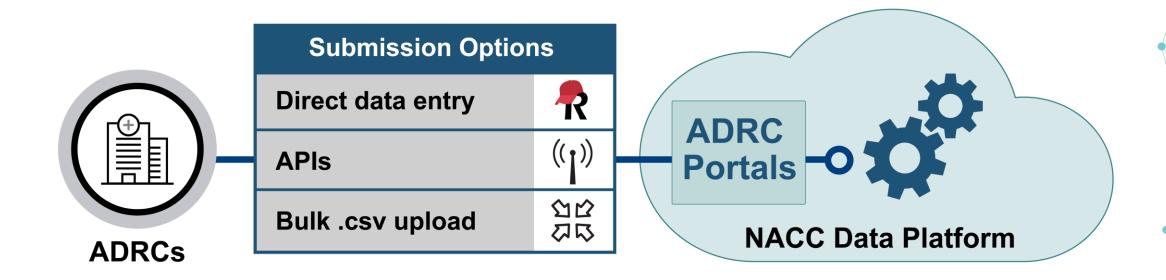






#### **Built a Modern Electronic Data Capture System**

Saves time, enhances sharing, and improves data quality







#### **Launched ADRC Portals**

ADRCs can submit, view, audit, access, and manage participant data across multiple data modalities

#### **ADRC Portals**

**Manage Participants** 



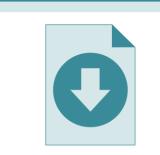
**Submit Data** 



View, Audit, and Access
Participant Data

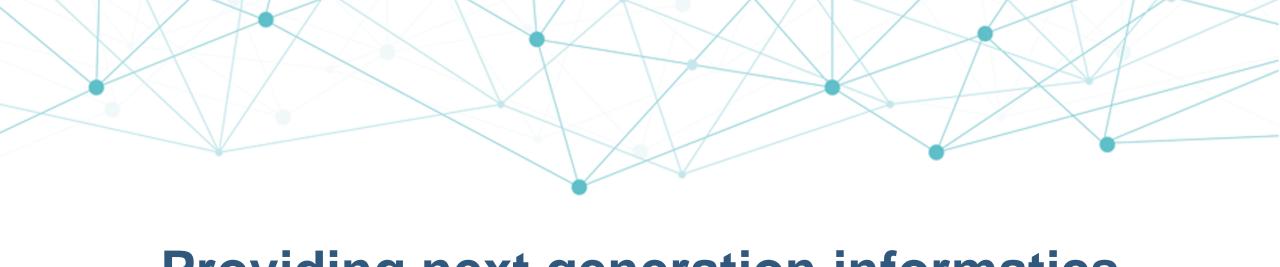


Download ADRC Program Report







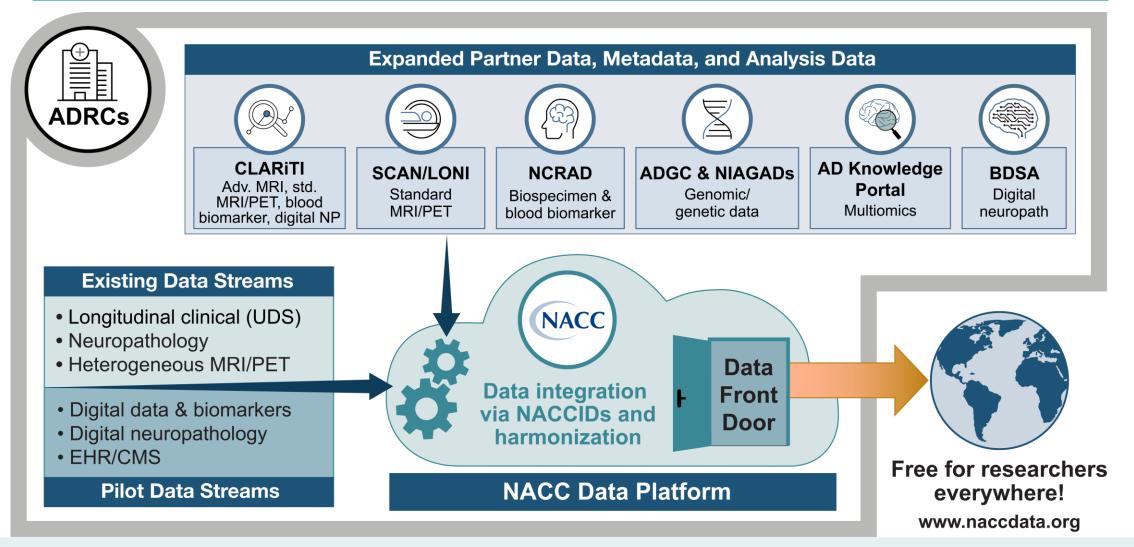


# Providing next generation informatics infrastructure to advance ADRD discovery and translation





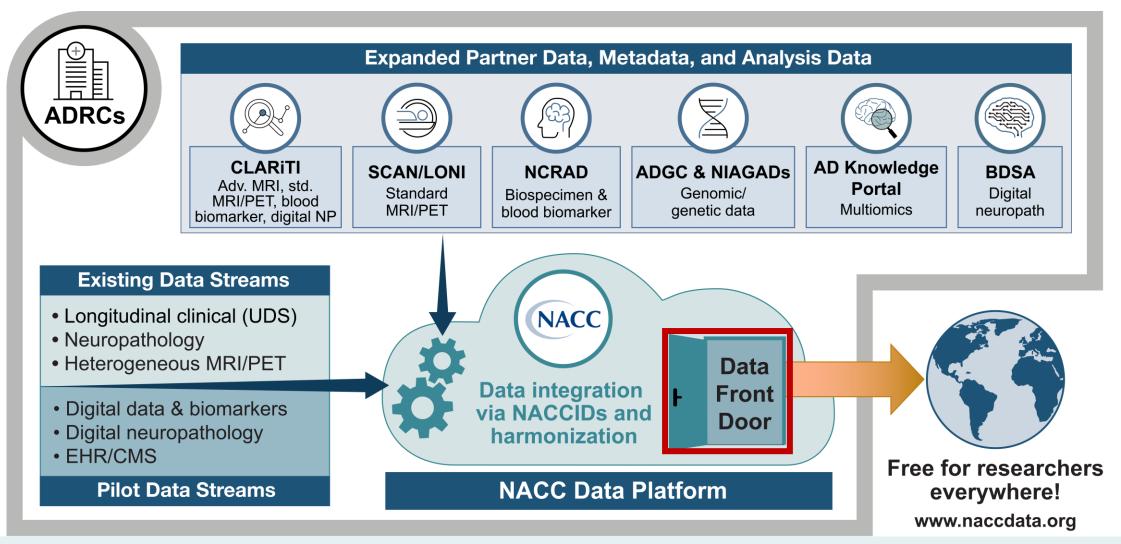
## New NACC Data Platform: A Modern Cloud-based Multimodal Data Integration, Harmonization, and Sharing Platform







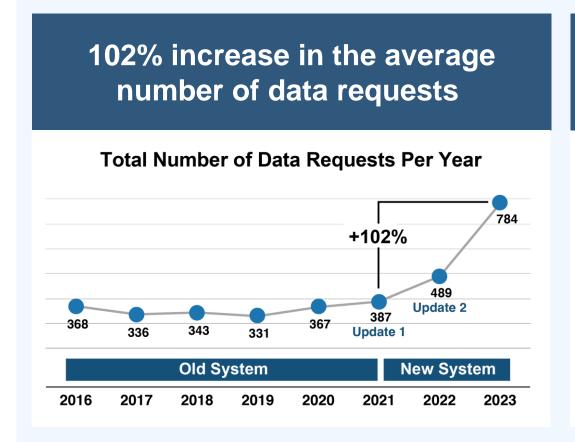
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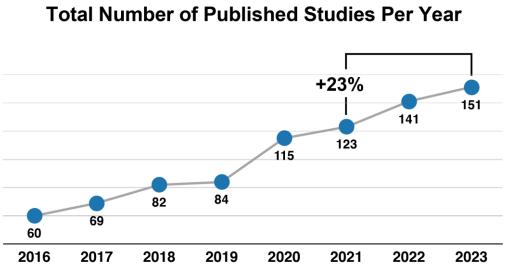




#### **Enabled Increased NACC Data Utilization**







System update 1: Expanded Quick-Access file types (FTLD, LBD, CSF, MRI, PET, scans)

System update 2: Data request survey through REDCap





#### **Advanced Multimodal Data Search and Access**

NACC's Data Front Door: A One-Stop-Shop for All ADRC Data





Visit scan.naccdata.org/





















#### Tackling Complex ADRD Challenges Requires Multimodal Data





Genetic and genomic

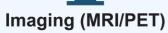
































### NI NIAGADS NCRAD







Alzheimer's Disease Center





COLUMBIA UNIVERSITY MEDICAL CENTER Center of Excellence for Alzheimer's Disease





Goizueta Alzheimer's **Disease Research Center** 



#### Leveraging Multimodal AD/ADRD Data to Advance Discovery

## AD/ADRD Multimodal Data Workshop

Friday, July 26th | 1-5pm ET

#### **Learning objectives:**

- Discover the multimodal data resources that are available from some of the leading ADRD data centers
- Pitch ideas and form teams for deciphering how multimodal data can best be leveraged to address the most pressing ADRD research questions
- Identify multimodal data infrastructure needs, gaps, and solutions

#### Register today!



AAIC 24



#### Thank you to our partners!















#### Join the NACC Session for More Information!



#### Tuesday, May 7th @ 10:00 - 11:30am CT (Zilker 1-2)

Topic	Speaker Name
Welcome and Introduction	Sarah Biber, PhD
NACC Data Platform	Sarah Biber, PhD
UDSv4 and NACC ID Updates	
UDSv4 Timeline	Sarah Biber, PhD
UDSv4 and NACCID Pilots	Jess Welsch, MBA
UDSv4 Onboarding and Training Resources	Sarah Gothard
UDSv4 Transition Strategy – Panel and Q&A	Greg Jicha, MD, PhD; Ari Bhaumik; Jeffery M. Burns, MD, MS; Sudeshna Das, PhD; Sarah Tomaszewski Farias, PhD <i>Moderator: Sarah Biber, PhD</i>



### Awards!





#### **Expanded New Investigator Award Program!**

#### **Program Highlights:**

- ☐ Expanded from 2 to 13 awards!
- □ Doubled the award amount now \$135K (Direct Costs) per project
- ☐ 156 applications from across 36 ADRCs









### Congratulations to our 2024 Awardees!

#### Each will receive \$135K (Direct Costs) for their Projects



Claire Clelland, MD, PhD
UC San Francisco ADRC



Daniel Fisher, MD, PhD U of Washington ADRC



Brian Gordon, PhD Washington U in St. Louis ADRC



Abbi Hernandez, PhD
U of Alabama at Birmingham ADRC



Annie Lee, PhD
Columbia U ADRC



Wonjae Lee, PhD
Duke U of North Carolina ADRC



Liang Ma, PhD
South Texas AD Center (STAC)



Malik Nassan, MD Northwestern U ADRC



Chris Rodgers, PhD Emory University ADRC



Jessica Schwarz, PhD
Mount Sinai SoM ADRC



Yuto Uchida, MD, PhD Johns Hopkins U ADRC



Xian Wu, PhD U of Kentucky ADRC



Emma Zang, PhD Yale University ADRC



#### **New Mentorship Program**

#### Providing value for all New Investigator Award applicants

NACC partnered with the REC to launch a companion mentorship program

- 77% of applicants participated in the program
- 80.2% of applicants strongly agreed that this mentorship strengthened their NI Award applications
- 92.2% of applicants are confident that they will apply this guidance to future grant applications
- 95.4% of mentors expressed interest in continuing their mentor role in future award cycles.









#### 2024 New Investigator Award Program

### THANK YOU! POSSOCIATION



Heather Synder, PhD
Alzheimer's Association
Vice President of Medical & Scientific Relations



Stephania Forner, PhD
Alzheimer's Association
Director of Medical & Scientific Relations



Katie Donlin
Alzheimer's Association
Award Grant Specialist





#### **2024 New Investigator Award Program**

#### **THANK YOU!**



#### Elizabeth Head, MA, PhD

Hussein Yassine, MD

Jose Cavazos, MD, PhD

REC Steering Committee

Claire Ghazal Nelson





### ALZHEIMER'S DISEASE AND RELATED DEMENTIAS DIGITAL PILOT PROGRAM

**Virtual Pitch Competition** 









Join us at the

## AD/ADRD Digital Pilot Program Pitch Competition

- Top applicants will pitch their proposals in front of a live audience
- Winners (1 to 3) will each be awarded \$250K-\$1M in funding (direct cost)

#### **REGISTER TODAY!**

**BIT.LY/NACC-DIGITAL-PILOTS** 

This virtual event is open to all!

#### **AD/ADRD DIGITAL PILOT PROGRAM PITCH COMPETITION**

#### AND THE FINALIST TEAMS ARE...

PI: Jeffrey Kaye, PhD

EFFECT-AD: Everyday Frequent Functional Evaluation with Crosscutting Technology for AD





PI: Joseph Winer, PhD

Characterizing sleep-wake activity patterns across the spectrum of AD/ADRD





PI: Raeanne Moore, PhD

CLARIFY- speeCh analysis And keystRoke tracking For early AD detection









PI: Ehsan Adeli, PhD

Scalable Next-Generation Smartphone Gait Assessment for Early Detection of AD/ADRD







PI: Kayci Vickers, PhD

Pilot Study to Evaluate VisMET on the Linus Health Platform at Multiple ADRCs









PI: Emma Rhodes, PhD

Remote Digital Monitoring to Detect
Behavioral & Neuropsychiatric Symptoms in
ADRD













# 2 YEARS

This progress has been made possible through our collaboration with the ADRC Program, CTF, EDC Workgroup, our partners,

and the team at NACC



#### **NACC Team**





WALTER KUKULL. PHD PI/Director, NACC Professor, Epidemiology



SARAH BIBER, PHD **Executive Director** 



KARI STEPHENS, PHD Associate Director, NACC. Professor, Family Medicine



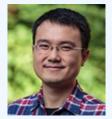
CHARLES MOCK, MD, PHD, FACS Associate Director, NACC Professor. Epidemiology and Surge



**KWUN CHUEN GARY** CHAN, PHD Associate Director Professor, Biostatistics, Health Systems and Population Health



DEAN K. SHIBATA, MD Co-investigator, NACC; Professor, Radiology



YEN-CHI CHEN, PHD Co-investigator, NACC Assistant Professor, Statistics



KYLE ORMSBY, PHD Co-Investigator Visiting Associate Professor, Mathematics



SHILPA ALLIMATTI. MA. MBA Tech Team Manager



**BEN KELLER. PHD** Software Engineer 3



**JANENE** HUBBARD, BS Research Consultant



CHANDIMA HEWA-ADUNGODAGE, PHD Software Engineer 3



JOYLEE WU Database Administrator



BRENDAN SMITH Web Developer



ZACH STARK. BBA Software Engineer 3



LAURA MCLEOD. BBA REDCap Developer



STACY OSWALD. MHSM Research Team Manager



JESSICA CULHANE. MS Research Scientist 3



**KATHRYNN GAUTHREAUX. MS** Research Scientist 3



**ZACK MILLER** Research Consultant



YUEXUAN WU. PHD Post-Doc



SARAH YASUDA Research Assistant



O'CONNELL **CLARiTI Program** Manager



JESS WELSCH. MBA Senior Project Manager



**ELISE GRUBER** Project Manager



**BRITTANY HALE** JULIE GORDON Project Manager



Administrative

Assistant

JINGYAN XIA Grants & Finance Manager



**EMILY ALMEDA** Administrative Coordinator



VALERIE HOCKENS BRITTANY FAIR, MS Program Ops Communications Specialist - Finance Manager



AILEEN IDA, MA Communication Specialist



**AMY YOUNG** Public Information Specialist



HANNAH ROSENTRETER Manager of Special Projects



FAITH **BUCKLEY, MBA** Admin Specialist



TINA MONROE HR Specialist







UNIVERSITY of WASHINGTON