

Curriculum Vitae

CHANDRAMALLIKA BASAK, Ph.D.
Cognitive Neuroscientist, Educator and Innovator

School of Behavioral and Brain Sciences
The Center for Vital Longevity
1600 Viceroy Drive, Suite 800
Dallas, TX 75235 USA

Phone (office): 972-883-3724
Fax: 972-883-3250
E-mail: cbasak@utdallas.edu

EDUCATION

2005 **Ph.D. / Experimental Psychology**
Syracuse University
Advisor: Paul Verhaeghen

2003 **M.S. / Experimental Psychology**
Syracuse University
Advisor: Paul Verhaeghen

2002 **M.S./ Applied Statistics**
Syracuse University
Advisor: Martin Sliwinski

1998 **M.Sc./ Psychology**
University of Calcutta, India

1996 **B.Sc. (Honours)/ Mathematics**
Bethune College, University of Calcutta, India.

Additional certificates:

- CometX Accelerator for Commercializing Innovation, University of Texas at Dallas, Jul-Aug 2023
- Basic and Intermediate Python Programming, University of Texas at Dallas, Summer 2022.
- Diploma in Computer Science, National Institute of Information Technology, India, 1994-1996.

ACADEMIC APPOINTMENTS

2018-
present **Associate Professor**
Department of Psychology, School of Behavioral and Brain Sciences
The Center for Vital Longevity
University of Texas at Dallas

2011- 2018 **Assistant Professor**
The Center for Vital Longevity, School of Behavioral and Brain Sciences,
University of Texas at Dallas

2010-2011 **Assistant Professor**
Department of Psychology, Rice University

2008- 2010 **Research Scientist**
Beckman Institute, University of Illinois at Urbana-Champaign

2005- 2008 **Beckman Institute Postdoctoral Fellow / Biological Intelligence and Human
Computer Interaction**
Beckman Institute, University of Illinois at Urbana-Champaign

PROFESSIONAL RECOGNITION AND HONORS

1st Prize Winner of the Big Idea Competition 2003
UT Dallas Institute for Innovation and Entrepreneurship. The prize money of \$40,000
funded me to launch a startup company, called Neu OptiMIND LLC., on technology-based solutions

to optimizing mind and brain to reduce risk of Alzheimer's disease and improve cognition in ADHD and DLD children and teens.

<i>Big Idea Competition Finalist, UT Dallas</i>	2023
Selected in a Start-up Accelerator hosted by UT Dallas for summer 2023.	
<i>Awarded the Norwegian Panorama VE/COIL Partnerships Initiative</i>	2023
Funded by the Norwegian Directorate for Higher Education and Skills (HK-dir) in consultation with American Association of Colleges and Universities (AAC&U), this initiative chose 9 applications to strengthen higher education ties between Norway, USA and Japan. Dr. Basak is leading the partnership between Kansai University (Japan) and University of Oslo (Norway) for using VE/COIL using her Adult Development and Aging course. Dr. Basak attended the 3-month online workshop and presented the UTDallas-KansaiU-UOslo team's VE/COIL course at Bergen, Norway, in June 2023.	
<i>Early Career Researcher Award</i>	2007
Cognitive Ageing Conference, Adelaide, Australia	
<i>Beckman Institute Postdoctoral Fellowship</i>	2005-2008
Beckman Institute, University of Illinois at Urbana Champaign; completion award granted in 2008.	
<i>Outstanding Dissertation Award, Syracuse University</i>	2006
<i>Syracuse University Teaching Fellowship</i>	2004; 2005 (declined)
Two-week summer fellowship to mentor incoming teaching assistants	
<i>Outstanding Teaching Assistant Award, Syracuse University</i>	2003
<i>Summer Research Fellowship, Syracuse University</i>	2000, 2004
<i>Syracuse University Graduate Student Fellowship</i>	1999, 2001
<i>Silver Medal, University of Calcutta, India</i>	1998
For securing first class, second rank in all-university M.Sc. (Psychology) examinations	

PROFESSIONAL MEMBERSHIPS/FELLOWSHIPS

Fellow of Psychonomic Society (2011- present)
Society for Neuroscience (2012-present)
American Psychological Association (2001- present)
Division 20: Adult Development and Aging (2001- present)
Division 21: Applied Experimental and Engineering Psychology (2013- present)
American Psychological Society (2004- present)
Cognitive Neuroscience Society (2010-present)
Gerontological Society of America (2010-2013)

FUNDING FOR ORIGINAL INVESTIGATION

Current Funding

Phase IIB Plasticity-based Adaptive Cognitive Remediation for Alzheimer's Disease

PI: Hyun Kyu Lee

Source: National Institute of Aging (2R44AG047722-07)

Site PIs and co-investigators: Basak (UT Dallas), Voss (UIowa)

Period of Support: 02/01/23 – 01/31/26. Total Award: \$2,764,846. Total subaward for Basak: \$717,024

Characterization of the Neurobiological Profiles of Young Adults with and without Developmental Language Disorder (DLD)

PI: Julia L. Evans

Mentors: Chandramallika Basak (Primary Mentor), Adam Eggebrecht (Secondary Mentor)

Source: NIH/National Institute on Deafness and Other Communication Disorders (1K18DC021149-01). Period of Support: 06/08/2023 – 05/31/2025. Total Award. \$424,876

Mobile fNIRS system to assess brain activity

PI: Chandramallika Basak

Source: AWARE. Period of Support: 04/30/2024- 04/29/2025. Total Award: \$30,000

Use it (Then Relax) or Lose it: Impact of Interleaved Cognitive-Meditation Training on Cognitive Function and Large-scale Brain Networks in Healthy Aging

PI: Paulina Skolasinska

Co-investigator and Faculty Mentor: Chandramallika Basak

Source: Friends for Brain Health Distinguished New Scientist Award. Period of Support: 09/30/21 – 09/30/23. Total Award: \$20,000.

Past Funding

Impact of Interleaved Cognitive-Meditation Training on Cognitive Function and Large-scale Brain Networks in Healthy Aging and Adult Developmental language Disorder

PI: Chandramallika Basak

Source: School of Behavioral and Brain Sciences, University of Texas at Dallas. Period of Support: 12/30/21 – 12/30/22. Total Award: \$19,000.

Shared mobile EEG system

PI: Mandy McGuire

Co-investigators: John Hart, Chandramallika Basak

Source: School of Behavioral and Brain Sciences Research Equipment Grants, University of Texas at Dallas. Period of Support: 12/30/21 – 12/30/22. Total Award: \$ 20,785

Strategic Training to Optimize Neurocognitive Functions in Older Adults

PI: Chandramallika Basak

Source: National Institute of Aging (1R56AG060052-01)

Period of Support: 09/30/18 – 8/31/21. Total Award: \$764,685.

Plasticity-based Adaptive Cognitive Remediation for Alzheimer's Disease Phase II

PI: Hyun Kyu Lee

Site PIs: Basak (UT Dallas), Voss (UIowa)

Source: National Institute of Aging (R44AG047722-04). Period of Support: 09/01/17 – 4/30/21.

Total Award: \$1,826,304. Total subaward for Basak: \$422,142

Optimizing Neurocognitive Functions in Healthy Aging

PI: Chandramallika Basak

Source: AWARE Dallas (Grant #20191484). Period of Support: 06/30/20 – 05/31/21. Total Award: \$16,000.

Attentional Control and Extensive Practice in Memory Updating: An fMRI study

PI: Chandramallika Basak

Source: Faculty Research Initiative, University of Texas at Dallas. Period of support: 11/01/17-08/15/19. TDC: \$10,000.

Influence of cardiovascular fitness of age-related differences in cognitive control.

PI: Chandramallika Basak

Source: Advanced Imaging Research Center (AIRC) Internal Award, University of Texas Southwestern Medical Center. Period of support: 3/27/18 – 08/30/18. TDC: \$13,500.

Encoding Specificity and Musical Expertise in Memory for Melodies: An fMRI Study

PIs: Chandramallika Basak and Walter Dowling

Source: Faculty Research Initiative, University of Texas at Dallas. Period of support: 11/01/17-08/15/18. TDC: \$5,000.

Impact of physical fitness on memory in older adults.

PI: Shuo Qin

Faculty Mentor: Chandramallika Basak

Source: Natural Sciences and Engineering Research Council (NSERC) grant. Period of Support: 10/01/16 -09/30/18. TDC: \$42,000.

Targeted Cognitive Interventions in MCI Adults for an Active Mind

PI: Chandramallika Basak

Source: Darrel K Royal Fund for Alzheimer's Disease. Period of support: 11/1/2014-10/30/2017. Total Award: \$165,000.

Neural Correlates of Cognitive Engagement in Elderly.

PI: Chandramallika Basak

Source: Faculty Research Initiative, University of Texas at Dallas. Period of support: 09/26/13-08/31/14. TDC: \$5,000.

Cognitive and Brain Plasticity in Aging.

PI: Chandramallika Basak,

Source: Faculty Research Initiative, University of Texas at Dallas. Period of support: 10/10/2011-08/15/2012. TDC: \$4,100.

Acting Out.

PI: Arthur F. Kramer

Co-investigators: Helga Noice, Tony Noice, Chandramallika Basak, Kirk Erickson, Neal Cohen.

Source: National Institute of Aging (NIA/NIH). Period of support: 10/1/2011-10/1/2015.

Capitalizing on Research on Animal and Human Brain Plasticity to Enhance WarFighter Training and Performance.

PI: Arthur F. Kramer

Co-investigators: Monica Fabiani, Gabriele Gratton, Daniel Simons, Walter R. Boot, Chandramallika Basak, Kirk Erickson, Wai-Tat Fu.

Source: Multidisciplinary University Research Initiative/ONR. Period of support: 09/15/2007-09/1/2012. TDC: \$6,750,000.

Enhancing cognitive and neural plasticity in older adults through strategic cognitive training.

PI: Chandramallika Basak

Source: Social Sciences Research Institute Seed Money Grant Program, Rice University. Period of support: Jan 2011- Aug 2011. TDC: \$19,931

Beckman Institute Fellowship.

PI: Chandramallika Basak

Source: Research Grant for Beckman Institute Post-Doctoral Fellowship Proposal, Beckman Institute, University of Illinois at Urbana-Champaign. Period of support: Aug 2005 – Aug 2008. Total Award: \$25,000 + Salary for 3 years.

Teaching Associate Grant.

Recipient: Chandramallika Basak

Source: Syracuse University; Received for course development as an instructor. Period of Support: Academic year 2003-2004. Total Award: \$ 1,100.

TEACHING

University of Texas at Dallas

Instructor

Fall 2023. Virtual Exchange/COIL teaching with University of Kansai (Japan) and University of Oslo (Norway) of CGS/PSY/SPAU 4386 (Adult Development and Aging)

Spring 2023, 2022, 2021, 2020, 2019, 2018, 2017, 2016, 2015, 2014, 2012. ACN/HCS/PSYC 6333 (Memory)

Fall 2019, Spring 2018, Fall 2017, Spring 2017, Fall 2016, Spring 2016, Fall 2015, Spring 2015, Fall 2014, Spring 2014, Spring 2013. PSY 3393/CGS 3340 (Experimental Projects in Psychology)

Guest Lecture in:

Fall 2011. HCS 6302 (Issues in Behavioral and Brain Sciences: Part I; School of Behavioral and Brain Sciences)

Spring 2016. CGS/NSC/PSY 4359 (Cognitive Neuroscience; School of Behavioral and Brain Sciences)

Spring 2022. ATCM 6327.501 (Experimental Publishing; School of Arts Technology and Emerging Communication)

Rice University

Instructor

Spring 2011. PSYC 590 (Advanced Seminar in Neuroscience)

Fall 2010. PSYC 308 (Memory)

Guest Lecture in:

Fall 2010. PSYC 520 (Foundations of Cognitive Psychology)

Syracuse University

Instructor

Spring 2004. PSY 252 (Statistical Methods II)

Spring & Fall 2003. PSY 252 (Statistical Methods II)

Spring 2001. PSY 205 (Foundations of Human Behavior)

Teaching Assistant

Fall 2002. PSY 252 (Statistical Methods II)

Summer 2001. PSY 205 (Foundations of Human Behavior)

Fall 2000. PSY 205 (Foundations of Human Behavior)

Mentoring of post-doctoral fellows under direct supervision

A Cris Hamilton, PhD: Aug 2010-June 2011

Shuo Qin, PhD: Oct 2019 -Oct 2021

Kaoru Nashiro, PhD: Aug 2012- Oct 2014

Amy Berglund-Barrazza, PhD: June 2023- present

Mentoring of doctoral students under direct supervision (UT Dallas)

Margaret O'Connell, PhD: Defended in Nov 2018

Shuo Qin, PhD: Defended in Aug 2019

Nicholas R. Ray, PhD: Defended in Jun 2021

Evan T. Smith, PhD: Defended in Aug 2021

Paulina Skolasinska, MS: Doctoral Candidate (ABD)

Francisco Sierra, BS: Doctoral Student
Micaela Andreo, BS: Doctoral Student

Mentoring of Psychological Sciences M.S. thesis under direct supervision (UT Dallas)

Erum Whyne, Spring 2016
Advika Venkataraman, Fall 2023- current

Mentoring of undergraduate honors thesis under direct supervision (UT Dallas)

Amsha Tummala Reddy, Spring 2019
Ashlyn Huang, Spring 2018
Aparna Gudimetla, Spring 2016
Esha Kanna, Spring 2024 (Expected)

Mentored/Mentoring 27 Undergraduate Students across various projects and thesis (UT Dallas).

Mentored/Mentoring 23 M.S. Students (UT Dallas) of Applied Cognition and Neuroscience (20 students) and Psychological Sciences (2 student) masters programs.

SERVICE

ADMINISTRATIVE WORK: PROFESSIONAL SOCIETIES AND ORGANIZATIONS

Leadership

Chair of the “Technology and Aging” Special Interest Group (SIG) of APA Division 20’s Early Career Task Force (2019-2022)

Chair of the “Intervention” Special Interest Group (SIG) of APA Division 20’s Early Career Task Force (2019-2020)

Editorship/editorial board member:

Associate Editor in Cognitive Neuroscience, specialty section of *Frontiers in Human Neuroscience* (April 2020 – present).

Editorial Board Member of *Restorative Neuroscience and Neurology* journal (Jan, 2018- Dec, 2021)

Guest Associate Editor of special issue (*Effects of Game and Game-Like Training on Neurocognitive Plasticity*) at *Frontiers in Human Neuroscience* (2016).

Reviewing:

External reviewer for Swiss National Science Foundation (SNSF) for a “Lead Agency/Weave procedure” research proposal, July 2023.

External reviewer for French Agence National De La Recherche (ANR) for a collaborative research project proposal, May 2021.

Member of Scientific Review Group/Special Emphasis Panel for National Institutes for Health (NIH) for R01 and R21 grants on special topics. April, 2023; March 2022; Nov 2019; Jun 2019.

Member of Scientific Review Group for National Institutes for Health (NIH) for Fellowships. Jun 2022; Oct 2021; Jun 2021 .

Member of Scientific Review Group for NIH for SBIR/STIRR proposals (EETN-10). Mar 2021; Jul 2020; Mar 2021; Jul 2020; Mar 2020.

Member of Scientific Review Group for *Cognition and Perception* Study Section, NIH. 2020-2021.

Reviewer for BBS Equipment Grant Proposals, UT Dallas, 2022

Reviewer for UT Dallas’ Office of Research’s Internal Seed Grant, Dec, 2019.

Reviewer of abstracts for the student/post-doc awards for Dallas ACC, 2019.
Reviewer of abstracts for the graduate student awards for Psychonomics Society, 2018.
Reviewer for National Science Foundation (NSF), BCS Division. 2018-2019; 2010-2011.
Member of review panel for Alzheimer's Association, 2014-2016.
Reviewer for National Science Foundation (NSF), Open Research Area for the Social Sciences, 2013.
Member of review panel for Smithsonian Institution and Indo-US Science & Technology Forum (IUSSTF).
Reviewer of abstracts for the Gerontological Society of America's conference, 2012.
Member of review panel for NIGMS' Minority Biomedical Research Support (MBRS) behavioral science grants (NIGMH/NIH); 2010-2011.

Ad-Hoc Referee in the following journals:

Aging, Neuroscience and Cognition; Alzheimer Disease & Associated Disorders ; Archives of General Psychiatry; Brain Research; Developmental Psychology; Frontiers in Aging Neuroscience; Frontiers in Human Neuroscience; Journal of Experimental Psychology: Human Perception & Performance; Journal of Experimental Psychology: Learning, Memory and Cognition; Journal of Gerontology: Psychological Sciences; Memory and Cognition; Neuropsychologia; Quarterly Journal of Experimental Psychology, Psychology & Aging; Psychological Science; Psychophysiology; PLOS ONE; Nature Scientific Reports, Neurobiology of Aging, Neuroimage, etc.

Mentoring:

Faculty mentor for a Post-doctoral Associate through APA Division 20 Mentor Matching Program (2018-2019).
Faculty mentor for a doctoral student through APA Division 20 Mentor Matching Program (2018-2020).
Served on a European Union Fellowship Application of a Graduate Student from University of Warsaw, 2021.
Faculty Mentor for a mid-career faculty on an NIH-funded K18 grant (2023-2025).

Administrative Work: School of Behavioral & Brain Sciences

Co-Chair of Psychology Inclusion, Diversity, Equity and Anti-racism (IDEA) Committee, 2022-present.
Member of Psychology Inclusion, Diversity, Equity and Anti-racism (IDEA) Committee, 2021-present.
Member of Graduate Application Review Committee for Psychology Department, 2021-2022.
Co-organized, with Dr. Ted Price, School of BBS's Science Lecture Series, 2018-2019.
Principal organizer of the Science Luncheon Series (Center for Vital Longevity) for Fall 2022, Fall 2019, Fall 2016 & Spring 2013. Each semester included inviting 6-7 external speakers and 4-5 local speakers.
BBS Strategic Planning Committee member, 2019- 2020.
Academic Advisory Council (AAC) member for Dean of the School of Behavioral and Brain Sciences, 2019 - 2020.
Admission committee member of Cognition & Neuroscience (CN) program's graduate students, 2012- 2016.
Steering committee member: Brain, Learning and Technology.
Organized potential graduate student visits (CN program) with Dr. McIntyre and Dr. Filbey, Jan 2013.
Research presentations at center-wide luncheons at Center for Brain Health (2012, 2016), Callier Center (2011), Center for Vital Longevity (2011), Cognitive Science brown bag (2011) and Neuroscience brown bag (2012).

Member in 2 Ph.D. Dissertation/Thesis Committees of UTD students, 2013-2015.
Member in 1 Ph.D. Dissertation Committees of UTD students, 2020-current.
Supervised and Chaired of 2 PhD dissertations (2018, 2019).
Supervising and Chairing 2 PhD Dissertations (2020- current).
Co-organized with Dr. Denise Park the Dallas ACC, 2015. Invited and organized visits of >20 external speakers; oversaw various events related to the conference.
Organized and conducted a video game workshop for the Director's Research Circle, Center for Vital Longevity, November 4, 2012. Location: iStation, Dallas, TX.
Research presentation to Advisor Council Members of Center for Vital Longevity, October 4, 2011. Location: Center for Vital Longevity.

Second Reader for Thesis and Projects (UT Dallas) for

Erin Kneble, Honors Thesis in Psychology, 2016
Mehmet Gunal, Second Year Project, 2018
Liang Han, Second Year Project, 2019
Candice Pattisapu, Second Year Project Proposal, 2020
Sabina Srokova, Second Year Project, 2020
Cymone Samuels, Honors thesis in Chemistry, 2021
Yuguang Zhao, Second Year Project, 2021.
Candice Pattisapu, Second Year Project, 2021
Jennifer Jenks (Undergraduate), Senior Thesis, 2021.
Hyung-Wong Kim Second Year Project, 2022
Mahnoor Muhammad (Undergraduate- Psychology and Child Development), Honors Thesis, 2022-2023.

Administrative Work: Committees

Member of UT Dallas Faculty Senate (Fall 2023 – present)
Chair of UT Dallas' University Core Committee (Fall 2022- present).
Member of UT Dallas' University CEP Committee (Fall 2022- present).
Member of UT Dallas' University CUE Committee (Fall 2022- present).
Member of UT Dallas Faculty Senate (Fall 2023 – present).
Member representing BBS at UT Dallas' University Core Committee (Fall 2021- present).
Dissertation committee member for Matthew Heard, (Cognition and Neuroscience), UT Dallas, 2022- present.
Chair, and Supervising Professor, of Dissertation Committee of Paulina Skolasinska (Cognition and Neuroscience), UT Dallas, April 2022- present.
Chair (Outside) for Katelyn Austin's Final Oral Defense (PhD in Psychology), UT Dallas, November 5, 2021.
Chair, and Supervising Professor, of dissertation committee for Evan T. Smith (Cognition and Neuroscience), UT Dallas, August 20, 2021.
Chair, and Supervising Professor, of dissertation committee for Nicholas R. Ray (Cognition and Neuroscience), UT Dallas, June 29, 2021.
Dissertation committee member for Amy Barraza-Berglund (PhD in Speech, Language and Hearing Sciences), UT Dallas, September 27, 2021.
Outside Chair for Austin W. Kingsolver's Final Oral Defense of PhD Dissertation (PhD in Political Science), UT Dallas, August 16, 2019.
Chair, and Supervising Professor, for Shuo Qin's Final Oral Defense of PhD Dissertation (PhD in Cognition and Neuroscience), UT Dallas, August 14, 2019.
Outside Chair for Milana Cherie Thomas' Final Oral Defense of PhD Dissertation (PhD in Materials Science and Engineering), UT Dallas, August 30, 2018.

Chair, and Supervising Professor, for Margaret Anne O'Connell's Final Oral Defense of PhD Dissertation (PhD in Psychological Sciences), UT Dallas, November 6, 2018.
Dissertation Committee Member for Katherine Fitzharris' PhD proposal (Communication Sciences and Disorders), UT Dallas, 2013-2014.
Dissertation Committee Member for Gerard Nisal Bischof's Final Oral Defense of PhD Dissertation (PhD in Cognition and Neuroscience), UT Dallas, 2013-June 2, 2014.
MA thesis committee member for Becky Lundwal, Rice University, 2011.
Dissertation committee member for Corinne Allen's Final Oral Defense of PhD Dissertation, Rice University, April 2012.
Dissertation committee member for Yi Guo (Glasser) Final Oral Defense of PhD Dissertation, Rice University, May 2012.
Ad-hoc Committee Member for mid-probationary review of Dr. Kristin Drogos (2019-2020).
Ad-hoc Committee Member for mid-probationary review of Dr. Catherine Thorn (2021-2022).
Ad-hoc Committee Member for mid-probationary review of Dr. Yune Lee (2022-2023).

Service: University, Center and Community

Set up collaboration with international universities (e.g., Kansai University, Japan; University of Geneva, Switzerland; University of Oslo, Norway) with help of UT Dallas Virtual Exchange (VE), or COIL (Collaborative Online International Learning) initiative, that connects students across different countries by linking classrooms and working on collaborative projects. I have attended all workshops over 2022 to set up my classroom for Fall 2023 for such collaborations.

Submitted a successful grant proposal with Prof. Carol Cirulli Lanham, to Norwegian Initiative on COIL, where UT Dallas (USA), Kansai University (Japan) and University of Oslo (Norway) will have one faculty in each school (I represent UT Dallas) for a Virtual Exchange classroom.

Invited Speaker and Visiting Faculty at the University of Geneva, Switzerland (Dec, 2022).
Invited Speaker by Dean Roehmer (AHT) to present at the Dean's Colloquium Series (Feb 25, 2022)
Invited Speaker at UT Dallas Scholar's Day (2022).
Faculty Co-mentor for the YWISE Project 4 Team (2022-2023), comprising of Townview SEM HS students of DISD who are using UTD design Studio and UTD's MakerSpace to make an inexpensive EEG prototype.

Invited Speaker at the ARDSI Calcutta Chapter, India. (September 19, 2021).
Invited Speaker at UT Dallas Summer Biology Camp (July 30, 2021).
Invited Panelist at Back to School Seminar, organized by *Breaking the Sigma* and *MannMukti* (UT Dallas Chapter) (October 9, 2021).
Invited Speaker at the UT Dallas *Research 411 Talk Show* hosted by the Office of Research Outreach and Engagement Campaign - #UTDResearchImpact (Feb 24, 2021).
Invited Speaker at Texas Academy of Mathematics and Science at the University of North Texas (Sep 18, 2020).
Invited Speaker at the Closing Symposium of the University of Amsterdam's Annual Summer School ("Gray matter: an interdisciplinary perspective on the aging brain"), co-hosted by the Institute for Interdisciplinary Studies and Amsterdam Brain and Cognition Center. (June 25, 2020).
Invited Panelist at the Audubon's Conservation Leaders for Young Women (ACL), (March 30, 2020). In this Career Panel, female high school students interested in STEM will sit in a round table conversation with female scientists, to learn about our chosen careers and the paths we took to get there.
Invited Speaker (Presentation title: "Improving Cognition") at the Jewish Community Center, Dallas, TX (March 6, 2020).

Faculty Sponsor for a student organization called MannMukti (UT Dallas Chapter). The aim of the organization is to encourage healthy, open dialogue of South Asian mental health issues in order to remove stigma, improve awareness and promote self-care.

Invited Speaker at the Rotary Club; Canyon Creek Country Club, Richardson, TX. (February 24, 2020).

Invited speaker and panelist at STAND UP SCIENCE show in Dallas (Jan 4, 2020). It is a 2 hr show where stand-up comedians and scientists come together to give fun TED-like talks.
https://www.shanemauss.com/club-dates-1/2020/1/4/dallas-tx?fbclid=IwAR3KIQxHo1S_gZKiWZXg28Fqgr-mj0Wq-ODp-DbvgZeUbxIQ0gRHI2iQDH4

Presentation (“Gamification and the Brain”) to the Director’s Research Circle of Center for Vital Longevity (CVL; Feb 2020).

Research presentation at the Grand Opening of the UT Dallas’ BrainHealth Imaging Center (Nov 22, 2019).

Participation as one of the Principal Investigator in the open house of CVL’s Director’s Research Circle (Oct 15, 2019).

Ad-hoc Committee Member for mid-probationary review of Dr. Kristin Drogos (2019-2020)

Speaker and guest of journalist and media personality Ms. Maria Shriver, who held Purple Luncheon, a fundraiser event in Dallas for Women’s Alzheimer’s Movement (WAM; Oct 29, 2018).

Research demo station by Basak lab on “Illusory Perceptions and Memories” at the Annual Gala of the Perot Museum of Science and Technology, Dallas (Nov 2017). This demo has led to a collaboration between Chandramallika Basak and Perot Museum to hold future demos and establish stations on cognitive psychology.

Presentation on improving memory to senior citizens at the St. Andrew’s Church, Plano, TX (Oct 2017).

Presentation on videogame training at Dallas Sherriff’s quarterly meeting (Aug 16, 2017).

Presentation on videogame training at Dallas Police Departments’ Executive Retreat, Kaufman, TX (April 12, 2017)

Interviewed by Dallas Morning News’ Senior Living Section about “Distraction and Cognition” (April 10, 2017)

Presentation at William B. Travis Academy (DISD)’s *Fab Friday* (Mar, 2017)

Served as a mentor to high school female students of the Hillcrest High School (DISD), under the Young WISE Investigators Program of UT Dallas, on a brain-computer interface robotic arm project (2014-2016), and a drone project (2016-2017). For 2017-2018, I led a team of YWISE high school students from Richardson ISD on how to code game-like virtual cognitive tools and understand the neural underpinnings of these different cognitive tools using a portable EEG system. Shuo Qin, a graduate student from my lab, won the “Best Graduate Student Mentor” award for 2017-2018.

Presentation on improving memory to senior citizens group at the Highland Park Presbyterian Church; Mar 10, 2017.

Presentation on the factors of healthy aging at Hispanic 100, Dallas; Nov 9, 2016.

Research Presentation at Green Week Celebration at CBRE, Dallas; Oct 11, 2016.

Presentation on physical fitness and brain at the Jewish Community Center’s inaugural “Fitizen” 2016 Day; May 25, 2016.

Presentation on healthy aging at Belmont Village (a senior living community); Dec 11, 2015.

Presentation at Dallas International School’s Career Day (Mar, 2015)

Presentation on healthy aging at the UT Dallas’ Retirees Association; Oct 15, 2014.

Interviewed for a documentary on Darrell K Royal on the awarded project and its relationship to Alzheimer’s disease; Fall 2014; Austin, TX.

Presentation on technology and aging at the iACT Summit Meeting in Dallas; May 21, 2014.

Badminton Mixed Doubles winner, thus securing Gold medal for University of Texas at Dallas at the “Corporate Challenge”, 2013.

Research presentation at the Scholar’s Day, UT Dallas’ recruiting event for prospective undergraduates; March 2, 2013.

UT Dallas’ Badminton Mixed Doubles winner with a student in the BBS, thus representing the school in the intramurals; Apr 3, 2012.

Interviewed at Channel CW33 (News at 9) for research on video games and cognition; March 8, 2013.

Presentation on improving memory at Highland Springs (a senior living community), Richardson, for University of Texas at Dallas’ *Good Neighbors* Program; Fall 2012.

Presentation on improving memory at The Tradition (a senior living community), North Dallas, for University of Texas at Dallas’ *Good Neighbors* Program; Fall 2012.

PUBLICATIONS (in reverse chronological order)

* Refers to publications from students and post-docs from Basak lab, with Dr. Basak (PI) as the corresponding author.

ARTICLES PUBLISHED IN REFEREED JOURNALS

1. *Smith, E.T. & **Basak, C.** (2023). Cognitive and structural predictors of novel task learning, and contextual predictors of time series of daily task performance during the learning period. *PLOS ONE*.(Expected publication date: Aug 2, 2023).
2. *Skolasinska, P.A, **Basak, C.**, & Qin, S (2023). Influence of Strenuous Physical Activity and Cardiorespiratory Fitness on Age-Related Differences in Brain Activations During Varieties of Cognitive Control. *Neuroscience*, 520, 58-83.
3. *Qin, S. & **Basak, C.** (2022). Fitness and arterial stiffness in healthy aging: modifiable cardiovascular risk factors contribute to altered default mode network patterns during executive function. *Neuropsychologia*, 172, 108269.
<https://doi.org/10.1016/j.neuropsychologia.2022.108269>
4. *Smith, E.T., Skolasinska, P., Qin, S., Sun, A., Fishwick, P, Park, D.C., & **Basak, C.** (2022). Cognitive and structural predictors of novel task learning, and contextual predictors of time series of daily task performance during the learning period. *Frontiers in Aging Neuroscience*, 14, 936528.
<https://doi.org/10.3389/fnagi.2022.936528>
5. *Qin, S. & **Basak, C.** (2022). Comparing the Effects of Two Cardiovascular Health Factors on Working Memory Capacity in Healthy Aging: Separate and Combined Effects of Arterial Elasticity and Physical Fitness. *The journals of gerontology. Series B, Psychological sciences and social sciences*, 77 (1), 94-103. <https://doi.org/10.1093/geronb/gbab177>
6. * Smith, E. T. , Bartlett, J.C., Krawczyk, D.C. & **Basak, C.** (2021).Are the advantages of chess expertise on visuo-spatial working-memory capacity domain specific or domain general? *Memory & Cognition*, 49(8), 1600–1616. <https://doi.org/10.3758/s13421-021-01184-z>
7. * Qin, S. & **Basak, C.** (2020b). Influence of multiple cardiovascular risk factors on task-switching in older adults: an fMRI study. *Frontiers in Human Neuroscience*, 14, 270.
<https://www.frontiersin.org/article/10.3389/fnhum.2020.561877>
8. Berglund-Barraza, A., Tian, F., **Basak, C.**, Hart, J. & Evans, J. (2020). Tracking changes in frontal lobe hemodynamic response in individual adults with Developmental Language Disorder following HD tDCS enhanced phonological working memory training: An fNIRS feasibility study. *Frontiers in Human Neuroscience*, 14, 362. <https://doi.org/10.3389/fnhum.2020.00362>
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27. Lee, H., Boot, W.R., **Basak, C.**, Voss, M.W., Prakash, R.P., Neider, M., Erickson, K.I., Simons, D.J., Fabiani, M., Gratton, G., Low, K.A., & Kramer, A.F. (2012). Performance gains from directed training do not transfer to untrained tasks. *Acta Psychologica*, *139*(1), 146-158. 10.1016/j.actpsy.2011.11.003
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36. Boot, W.R., **Basak, C.**, Erickson, K.I., Neider, M., Simons, D.J., Fabiani, M., Gratton, G., Voss, M.W., Prakash, R., Lee, H., & Kramer, A.F. (2010). Strategy, Individual Differences, and Transfer of Training in the Acquisition of Skilled Space Fortress Performance. *Acta Psychologica*, *135*, 349-357. 10.1016/j.actpsy.2010.09.005
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43. Verhaeghen, P., Cerella, J., & **Basak, C.** (2004). A Working-Memory Workout: How to expand the focus of serial attention from one to four items, in ten hours or less. *Journal of Experimental Psychology: Learning, Memory and Cognition, 30*(6), 1322-1337. 10.1037/0278-7393.30.6.1322
44. **Basak, C.**, & Verhaeghen, P. (2003). Subitizing speed, subitizing range, counting speed, the Stroop effect, and aging: Capacity differences, speed equivalence. *Psychology and Aging, 18*, 240-249. 10.1037/0882-7974.18.2.240

CHAPTERS PUBLISHED IN EDITED VOLUMES

1. **Basak, C.** & Qin, S. (2018). Virtual cognitive training in healthy aging and mild cognitive impairment. In R. Pak & A.C. McLaughlin (Eds.). *Aging, Technology, And Health*. New York: Elsevier. 215-235.
2. **Basak, C.**, & Zelinski, E. (2013). A hierarchical model of working memory and its change in healthy older adults. In T.P. Alloway & R.G. Alloway (Eds.). *Working memory: The connected intelligence*. New York, London: Psychology Press. 83-106.
3. Stine-Morrow, E.A.L., & **Basak, C.** (2011). Cognitive Interventions. In K.W. Schaie & S.L. Willis (Eds.). *Handbook of the Psychology of Aging* (Seventh Edition). New York: Elsevier. 153-171.
4. Verhaeghen, P., Cerella, J., **Basak C**, Bopp, K.L., Zhang, Y., & Hoyer, W.J. (2007). The ins and outs of working memory: Dynamic processes associated with focus switching and search. In Osaka, N., Logie, R. & D'Esposito, M. (eds.). *The Cognitive Neuroscience of Working Memory*. Oxford, UK: Oxford University Press. 81-97. doi:10.1093/acprof:oso/9780198570394.003.0005
5. Verhaeghen, P., Cerella, J., Bopp, K.L., & **Basak, C.** (2005). Aging and varieties of cognitive control: A review of meta-analyses on resistance to interference, coordination and task switching, and an experimental exploration of age-sensitivity in the newly identified process of focus switching. In R. W. Engle, G. Sedek, U. von Hecker, & D. N. McIntosh (Eds.). *Cognitive Limitations in Aging and Psychopathology: Attention, Working Memory, and Executive Functions*. Cambridge, MA: Cambridge University Press. 160-179.

OTHER WRITINGS

6. **Basak, C.** (2010). Can older adults enhance their cognitive skills with video game interventions? *CyberTherapy and Rehabilitation, 3*(2), 33.

INVITED OR REFEREED PRESENTATIONS TO PROFESSIONAL MEETINGS/SEMINAR/ COLLOQUIA ASSEMBLIES

1. **Basak, C.** (Invited speaker at University of Geneva, 2022). *Brain-based mechanisms of cognitive enhancements in aging: benefits of computerized cognitive training and cardiovascular health*.
2. **Basak, C.** (Invited speaker at UT Dallas Scholar's Day, 2022). *Different Brains for Different Gains: Cognitive and Brain Plasticity in Adulthood and Agig*.

3. **Basak, C.** (Invited speaker at ATEC's Dean's Colloquium Series, UT Dallas, 2022). *Cognitive and Brain Plasticity from BirdWatch game: Results from a Phase I Clinical Trial.*
4. **Basak, C.** (Invited speaker at ARDSI Calcutta Chapter's Know Dementia Know Alzheimer's Series, India, Virtual, Sep 2021). *Importance of study participants in research on prevention of dementia: a USA perspective.*
5. **Basak, C.** (Invited speaker at Invited colloquia speaker at Center for Vital Longevity, University of Texas at Dallas, Dallas, TX, Oct 2020). *Cardiovascular Health as a Protective Factor Against Age-Related Declines in Executive Functioning.*
6. **Basak, C.** (Invited speaker at Dallas Aging and Cognition Conference, Dallas, TX, January 2022). *TBA.*
7. **Basak, C.** (invited speaker at University of Amsterdam, NL, June 2020). *Improving Neurocognition in Aging.*
8. **Basak, C.** (Invited speaker for 2 research presentations at South Western Psychological Association, Frisco, TX, March 2020). Cancelled due to COVID-19 epidemic.
9. **Basak, C.** (Invited speaker at *Intuitive Surgical Robotics Training and Education Research Meeting*, Department of Surgery, UTSW Medical School, Dallas, TX, August 16 2019). *Skill Acquisition and Memory for Aging Individuals.*
10. **Basak, C.,** Skolasinska, P.A., & Qin, S. (Invited speaker at Dallas-Austin Area Memory Meeting, Center for Vital Longevity, UT Dallas, Dallas, TX, September 2019). *Effects of Predictability, Switching, and Updating on Task Performance and Brain Activation Among Low Fit and High Fit Older Adults.*
11. Smith, E.T., Bartlett, J., Krawzyck, D., & **Basak, C.** (Invited speaker at Dallas-Austin Area Memory Meeting, Center for Vital Longevity, UT Dallas, Dallas, TX, September 2019). *Are the Advantages of Chess Expertise on Visuo-Spatial Working Memory Capacity Domain Specific or Domain General?*
12. **Basak, C.** (Invited speaker at University of Texas A&M, Commerce, TX, December 2018). *Aging brain and its plasticity.*
13. **Basak, C.** (Invited speaker at Dallas Austin Area Memory Meeting, Baylor University and VA, Waco, TX, September 2018). *Age-related differences during switching and updating mechanisms of cognitive control.*
14. Smith, E.T. & **Basak, C.** (Invited speaker at Dallas Austin Area Memory Meeting, Baylor University and VA, Waco, TX, September 2018). *Cognitive and gray matter predictors of two types of video-games in older adults.*
15. **Basak, C.** (Invited speaker at Dallas-Austin Area Memory Meeting, University of Texas, Austin, TX, September 2017). *Benefits of cognitive training in healthy aging and MCI: A meta-analysis and ToWMA.*
16. Ray, N.R.R., O'Connell, M.A., Nashiro, K., Smith, E.T., Qin, S. & **Basak, C.** (Invited speaker at Dallas-Austin Area Memory Meeting, University of Texas, Austin, TX, September 2017). *Evaluating the relationship between white matter integrity, cognition and varieties of video game learning.*
17. **Basak, C.** (Overview Talk of the *Plenary Session 5: Training and Training-Related Transfer to Daily Life*, Aging and Cognition Conference, Zurich, Switzerland, April 2017). *Benefits of cognitive training in healthy aging and MCI: A comprehensive meta-analysis.*
18. **Basak, C.** (Invited speaker at the Spring Lecture Series of Center for Children and Families, UT Dallas, Dallas, TX, March 2017). *Benefits of cognitive training in healthy aging and MCI: A comprehensive meta-analysis.*
19. **Basak, C.** (Invited speaker and panelist at "Neuroscience and Society" series hosted by American Association for the Advancement of Science (AAAS) and the Dana Foundation, Washington, D.C., March 2017). *Are all games create equal?*
20. O'Connell, M.A. & **Basak, C.** (Invited speaker at Dallas-Austin Area Memory Meeting, Center for Vital Longevity, Dallas, TX, Sep, 2016). *Long-term semantic memory influences working memory.*

21. Qin, S. & **Basak, C.** (Invited speaker at Dallas-Austin Area Memory Meeting, Center for Vital Longevity, Dallas, TX, Sep, 2016). *Corpus Callosum, Illusory conjunctions and Visual Short-term Memory.*
22. **Basak, C.** (Invited colloquia speaker at University of Texas, Arlington, TX, Mar, 2016). *Devising the best strategies to improve cognition through cognitive training.*
23. **Basak, C.** (Invited colloquia speaker at University of Texas, Austin, TX, Mar, 2016). *Cognitive training, Plasticity and Aging.*
24. **Basak, C.** (Invited speaker at Texas Organization of Rural & Community Hospitals Conference (TORCH), San Antonio, Texas, Jun, 2013). *Cognitive training strategies: Brain and cognition in healthy aging.*
25. **Basak, C.** (Symposium 4: Cognition, Mind to Behaviors- From Neurological Infrastructure to Social Behavior Applications, BIT's 3rd Annual Congress of Neurotalk, Beijing, China, May 2012). *Brain volume, strategy manipulations and video game learning induced plasticity.*
26. **Basak, C.** (Invited colloquia speaker at Texas A&M University, College Station, TX, Dec, 2012). *Fitness, brain and cognition in older adults.*
27. **Basak, C.** (Invited colloquia speaker at Wofford College, Spartanburg, SC, Nov, 2012). *Different folks for different folks: Effective training strategies, transfer and biomarkers of cognitive training.*
28. **Basak, C.** (Invited colloquia speaker at University of Zurich, INAPIC, Switzerland, Jun 2011). *Inducing cognitive and brain plasticity in older adults.*
29. **Basak, C.** (Invited colloquia speaker at Davis School of Gerontology, University of Southern California, Los Angeles, CA, March, 2011). *A hierarchical model of working memory.*
30. **Basak, C.** (Invited colloquia speaker at Center for Vital Longevity, University of Texas at Dallas, Dallas, TX, Jan 2011). *Keeping mind and body fit: Its effects on brain and cognition in older adults.*
31. **Basak, C.** (Invited colloquia speaker at Université de Provence, Marseilles, France, Apr, 2008). *Working Memory, plasticity and elderly.*
32. **Basak, C.** (Invited colloquia speaker at Washington University, St. Louis, MO, Jun 2006). *Video game training and cognitive plasticity in elderly.*
33. **Basak, C.** (Invited speaker and workshop director at Indian Statistical Institute, Calcutta, India, May 2006). *Video game training and cognition.*
34. **Basak, C.** (Invited speaker at Duke University, Durham, NC, January, 2005). *Three tiers of working memory: Accessibility and availability.*

SELECTED ORAL PRESENTATIONS TO PROFESSIONAL MEETINGS

1. **Basak, C.** (Session speaker at the Dallas Aging and Cognition Conference, Dallas, TX, January 2023). *Meta-analysis of executive function training: fMRI evidence for differential changes in attentional networks and dorsal striatum.*
2. **Basak, C.** (Plenary Session; Presented by **Basak, C.**, Annual meeting for Psychonomics Society, Boston, Nov, 2022). *Meta-analysis of executive function training: fMRI evidence for differential changes in attentional networks and dorsal striatum.*
3. Skolasinksa, P.A & **Basak, C.** (Presentation at the Psychology Lecture Series, Feb 2021). *Influence of Physical Fitness on Age-Related Differences in Varieties of Cognitive Control: BOLD Modulation during Predictability, Switching and Updating.*
4. **Basak, C.**, Sun, A., Qin, S. & Dowling, W.J. (Talk at the DataBlitz Session 2, Annual virtual meeting for the Cognitive Neuroscience Society, Mar 2021). *Encoding Specificity, Updating and Musical Expertise in Working Memory for Melodies: An fMRI Study*
5. **Basak, C.**, Smith, E., & Fishwick, P. (Symposium: Technology to Support Successful Aging, American Psychological Association, APA 2020 Virtual, Aug, 2020). Development and Implementation of an App to Support Cognitive Functioning: the ViCTOR Trial.
6. **Basak, C.** & Qin, S. (Symposium: Modifiable Factors in Cognitive Aging, American Psychological Association, APA 2020 Virtual, Aug, 2020). Cardiovascular health as a protective factor against age-related declines in switching and updating: two fMRI studies.

7. *Smith, E.T., Bartlett, J., Krawzyck, D. & **Basak, C.** (Plenary Session; Presented by **Basak, C.**, Annual meeting for Psychonomics Society, New Orleans, Nov, 2018). Are the Advantages of Chess Expertise on Visuo-spatial Working Memory Capacity Domain Specific or Domain General?
8. **Basak, C.**, Qin, S., O'Connell, M.A. (*Symposium: Cognitive and Neural Plasticity in Old Age*, Cognitive Aging Conference, Atlanta, G.A, May, 2018). Comparing cognitive benefits from single-component and multi-component cognitive training modules: A meta-analysis of randomized controlled trials in healthy aging and mild cognitive impairments.
9. **Basak, C.**, Qin, S. & O'Connell, M.A. (*Plenary session*, Annual meeting for Psychonomics Society, Vancouver, Canada, Nov, 2017). Differential effects of cognitive training modules on healthy aging and mild cognitive impairment: A comprehensive meta-analysis of randomized controlled trials.
10. Qin, S., Nashiro, K., O'Connell, M.A., & **Basak, C.** (*Nanosymposium*, Society for Neuroscience, Washington D.C, Nov 2017). Age-related differences in brain activation during continuous memory updating.
11. O'Connell, M.A. & **Basak, C.** (*Nanosymposium*, Society for Neuroscience, Washington D.C., Nov. 2017). Effects of task complexity and age on functional connectivity of attentional networks.
12. **Basak, C.** (Symposium, 21st IAGG World Congress of Gerontology and Geriatrics, San Francisco, CA, July, 2017). Playing for Keeps: Effects of video game training on neural and cognitive plasticity in older adults.
13. **Basak, C.**, O'Connell, Nashiro, K., Qin, S. & Smith, E. (*Plenary session*, Annual meeting for Psychonomics Society, Boston, MA, Nov, 2016). What's your game? Game playing strategy interacts with video game learning and cognitive gains in older adults.
14. **Basak, C.**, Nashiro, K., O'Connell, M.A., Chen, X., & Qin, S. (*Plenary session*, Annual meeting for Psychonomics Society, Chicago, IL, Nov, 2015). RTS video game training in older adults: Immediate and long-term cognitive gains, and individual differences in gaming.
15. Qin, S., Nashiro, K., O'Connell, M.A., Chen, X., & **Basak, C.** (*Nanosymposium*, Society for Neuroscience, Chicago, IL, Oct 2015). Age-related differences in task load, response compatibility and selective attention in task switching: An fMRI study.
16. **Basak, C.**, O'Connell, M.A., Qin, S., Nashiro, K., Chen, X., & Druskis, M. (Armadillo Conference, Waco, TX, Oct, 2015). Determining the cognitive and neural mechanisms of varieties of videogame learning.
17. **Basak, C.**, O'Connell, M.A., Qin, S., Nashiro, K., Chen, X., & Druskis, M. (*Game Symposium*, American Psychological Association, Toronto, July 2015). Cognitive and neural plasticity from videogame training.
18. **Basak, C.** (*Symposium*, ICPS, Psychological Science, Amsterdam, Mar 2015). Playing for keeps: Effects of Real-time strategy game training on cognition and neural activity.
19. **Basak, C.** (Presentation at Dallas ACC, Jan 2015). Playing for keeps: The aging brain on video games.
20. O'Connell, M. A., & **Basak, C.** (Armadillo Conference, Norman, OK., Oct., 2014). *Testing a hierarchical model of working memory: Age and long-term memory's influence on verbal recognition memory.*
21. **Basak, C.** (*Plenary session: Working Memory I*; Annual Meeting of Psychonomic Society, Nov 2013, Toronto, Canada). *A New Model of Working Memory: Investigating the Best Strategies to Enhance Attentional Focus and Untrained Cognitive Skills.*
22. **Basak, C.**, Boot, W.R., & Kramer, A.F. (*Symposium: Engaged Aging through Technology*, 121st Annual Convention of American Psychological Association: Division 21, Honolulu, HI, Jul, 2013). *The best ways to boost cognition: Separate and combined effects of video game training and physical fitness training.*

23. **Basak, C.** (*Symposium: Cognitive Reserve in Aging: Can Leisure Activities Increase Neuroplasticity?* 25th APS Annual Convention, Washington, DC, May, 2013). *Video game training: Strategy induced changes in cognitive abilities and brain function.*
24. **Basak, C.,** Kim, J.S., Voss, M.W., Prakash, R., Erickson, K.I., Szabo, A., McAuley, E., & Kramer, A.F. (*Plenary Session 7: Health and Cognition*, Cognitive Aging Conference, 2012, Atlanta, USA). *Determining a causal relationship between fitness and cognition in late adulthood.*
25. **Basak, C.,** Kim, J., Erickson, K., Voss, M., Szabo, A., McAuley, E., & Kramer, A.F. (*Paper: Cognition: Lifestyle and Other Interventions*, 64th Annual Scientific Meeting, Gerontological Society of America, 2011, Boston, MA). *Cardiorespiratory fitness predicts cognitive abilities in late adulthood.*
26. **Basak C.** (Armadillo XX, 2010, College Station, TX). *Multiple indices of working memory.*
27. **Basak C.,** Voss M.W., Boot W.R., Erikson K.I., Kramer A.F. (*Plenary Session 6: Training*, 20th Cognitive Aging Conference- Down Under, 2007, Adelaide, Australia). *Can older adults benefit from videogame training? Relationship among cognition, game performance and brain structure.*
28. **Basak C.,** Kramer A., Verhaeghen P. (*Plenary Session 8: Dual tasks and Attention*; Cognitive Aging Conference, 2006, Atlanta). *Aging, focus-switching and working memory span: Exploring the role of pointer predictability.*
29. Verhaeghen P., **Basak C.** (*Plenary Session 7: Cognitive Control*: Cognitive Aging Conference, 2004, Atlanta). *Aging and control over the switching of the focus of attention: Evidence for a new age-sensitive process.*
30. **Basak C.,** Verhaeghen P. (CSAIL, 2005, Hood River, OR). *Circles of working memory: Exploring the capacity of the focus of attention and the retrieval dynamics of focus-switching.*
31. *Verhaeghen P., Cerella J., **Basak C.** (*Plenary session*, Presented by **Basak, C.** at the 2003 Annual Meeting of the Psychonomic Society, Vancouver, Canada). *Extensive training in N-Back task expands the size of focus of attention from 1 to 4.*
32. **Basak C.** (Presentation at 2003 Annual E.F. Gardner Conference on Measurement and Evaluation). *Time-series analysis of response time measures applied to practice effects on an N-Back task.*
33. **Basak C.,** Verhaeghen P. (Presentation at 2002 Annual E.F. Gardner Conference on Measurement and Evaluation). *Subitizing and counting processes, aging, and Stroop effect: Capacity differences, speed equivalence.*
34. Dutta A., **Basak C.,** Mukhopadhyay P., Das S.K., Ganguli P.K., Roy T., Maity B. (Presentation at IANCON '99, Calcutta, India). *Neural network of cognitive functions: An imaging and psychometric correlation.*