

Research interests

Overall — Designing computational tools to support human activities

Fields — HCI, Design, Affect & Cognition

PhD Study — development of a new design method, that gives order and sequence of events on the nature

Education

2009 – 2017 **Ph.D., Human-Computer Interaction**
Iowa State University, Ames, IA, USA

Dissertation: Emotion Centered Design: Affect, Think and Act
GPA: 3.85/4.00

08–09/2011 **Graduate Certificate, Affective Science & Computing**
Swiss Center for Affective Sciences, University of Geneva, Switzerland

Course of Study: Verbal and Nonverbal Expression of Emotions
- Completed the course with 3 credits.

2000–2005 **B.Sc., Computer Engineering**
Erciyes University, Kayseri, Republic of Turkey

- Completed a curriculum with X courses and X credits, of which %X are computer science courses, X% computer engineering courses, X% electronic courses, and X% ... courses.

Awards & Honors

2009 – 2016 **Multiple Professional Development Grants — Iowa State Departments**
Offered by Graduate and Professional Student Senate, HCI & ECpE Department

2013 **Conference Registration Pass — The Conference Organizing Committee**
attended Grace Hopper Celebration of Women in Computing Conference

2012 **Full Conference Attendance Grant — Northrop Grumman, USA**
attended Grace Hopper Celebration of Women in Computing Conference

2011 **Travel & Summer School Registration Grants — 2 different institutions**
offered by Iowa State University & Turkish National Ministry of Education
attended Int. Summer School in Affective Sciences.

2011 **Full Conference Attendance Grant — Microsoft USA, & Google USA**
attended CRA-W Grad Cohort for Women Meeting (Women in Graduate Programs in Computing Fields)

- 2011 **Social Innovation Leaders training award — Dell Inc. Company, USA**
- 2009 – 2014 **PhD scholarship in Wearable Computers, Turkish National Ministry of Education**

Professional Experience

- 2017 – ~ **Compulsory “Public Service on HCI” at National Public Universities**
 Republic of Turkey
 Completing the public service in exchange of all required costs of four years of graduate study abroad (PhD Study on HCI at USA).
- 2009 – 2017 **PhD Researcher, Virtual Reality Applications Center (VRAC)**
 Iowa State University, Ames, IA, USA
 Studied interaction designs between human and computers (HCI), developed a new design method, called “emotion centered design”, decoding the order and sequences of action responses between objects and/or peoples.
 Developed a new method recognizing human affects (emotion, personality etc.) from bodily interactions with devices.
- 2006 – 2009 **Graduate Researcher, Gazi University**
 Ankara, Republic of Turkey
 Studied artificial intelligence (AI), machine learning (ML) and computer security.
- 2007 – 2009 **Prospective Student Advisor, Gazi University**
 Ankara, Republic of Turkey
- 2005 – 2009 **Undergraduate Academic Advisor, Gazi University**
 Ankara, Republic of Turkey
- 2005 – 2009 **Lab Instructor, & Guest Lecturer, Gazi University**
 Ankara, Republic of Turkey
- 2005 – 2009 **Editorial Assistant — Journal of Engineering and Architecture**
 Gazi University, Ankara, Republic of Turkey
- 2005 – 2009 **Teaching Assistant, Gazi University**
 Ankara, Republic of Turkey

Teaching Experience

- _____ as a Lecturer
- SPRING 2019 **Digital Logic Design, Erzurum Technical University**
 Erzurum, Republic of Turkey
 An undergraduate class, with topics covering design of digital logic circuits for arithmetic operations, storage elements (latch, register, counters etc.) and more.
- _____ as a Guest Lecturer
- FALL 2007 **Object Oriented Programming, Gazi University**

Ankara, Republic of Turkey

a topic as part of Software Engineering, an undergraduate class.

_____ as a Teaching Assistant

FALL 06–08 **Software Engineering, Gazi University**

Ankara, Republic of Turkey

an undergraduate class.

SPRING 07–08 **Computer Programming I, Gazi University**

Ankara, Republic of Turkey

The class covers the topic of “C Language & Functional Programming”, an undergraduate class.

FALL 2007 **Computer Programming II, Gazi University**

Ankara, Republic of Turkey

The class covers the topic of “C# and Object Oriented Programming”.

FALL 2008 **Computer and Information Security, Gazi University**

Ankara, Republic of Turkey

a graduate class.

SPRING 06– 09 **Discrete Mathematics, Gazi University**

Ankara, Republic of Turkey

an undergraduate class.

_____ as a Laboratory Instructor

SPRING 07–08 **Computer Programming I Lab, Gazi University**

Ankara, Republic of Turkey

The lab class is to help students develop their practical skills on “C and Functional Programming”, an undergraduate lab.

FALL 2007 **Computer Programming II Lab, Gazi University**

Ankara, Republic of Turkey

The lab class is to help students develop their practical skills on “C# and Object Oriented Programming”, an undergraduate lab.

SPRING 07 – 09 **Physics Lab, Gazi University**

Ankara, Republic of Turkey

an undergraduate lab.

Publications

_____ Dissertation

2017 **Emotion Centered Design: Affect, Think and Act**

Iowa State University, Ames, IA

_____ Conference papers

In Human–Computer Interaction, top-tier conferences (< 30% acceptance rate (AR)) are as—or

more—impactful than journals; see <http://dx.doi.org/10.1145/1743546.1743569>.

- C05 2014 **Detection of predictability ratings of live events on TV by use of second screens**
Kiraz Candan Herdem
ACM TVx 2014: 2014 ACM international conference on Interactive experiences for TV and online video, Newcastle UK, (39-46), 25% AR
- C04 2012 **Reactions: Twitter Based Mobile Application for Awareness of Friends' Emotions**
Kiraz Candan Herdem
UbiComp 2012: ACM Conference on Ubiquitous Computing, Softec 2012 Workshop, 5-8 September 2012, Pittsburgh, PA
- C03 2012 **Sensing Emotional State of Mobile Users for Improving Mobile Social Interaction**
Kiraz Candan Herdem
Pervasive 2012: ACM Conference on Pervasive Computing, Doctoral Consortium, 18-22 June 2012, Newcastle, UK
- C02 2012 **Sensing Emotional State of Mobile Users for Improving Mobile Social Interaction**
Kiraz Candan Herdem
ISWC 2012: IEEE Symposium on Wearable Computers, Doctoral Consortium, 18-22 June 2012, Newcastle, UK
- C01 2012 **Designing for Cultural Connections**
Peters, A., Mennecke, B., Camou, J., *Herdem, K. C.*, Zhang, L.
HCI International 2011, 9-14 July 2011, Orlando, Florida
- _____ Posters
- P08 2014 **Emotion Recognition**
Kiraz Candan Herdem
Graduate and Professional Student Conference 2014, 4 April 2014, Ames, IA
- P07 2012 **Sensing Emotional State of Mobile Users**
Kiraz Candan Herdem
ISWC 2012, 18-22 June 2012, Newcastle UK.
- P06 2012 **Sensing the Emotional state of Mobile Users for improving Mobile Social Interaction**
Kiraz Candan Herdem
ETC 2012, 19 April 2012, Ames, IA
- P05 2012 **Recognizing Emotional State of Mobile Device Users**
Kiraz Candan Herdem
Department of ECpE Annual Graduate Poster Sessions, 12 April 2012, Ames, IA
- P04 2011 **Affective Human-Computer Interaction using Wearables in Mobile Context**
Kiraz Candan Herdem
International Summer School in Affective Science 2011, 22- 30 August 2011, Bossey, Switzerland
- P03 2011 **Designing for Cultural Connections**
Peters, A., Mennecke, B., Camou, J., *Herdem, K. C.*, Zhang, L.
HCI International 2011, 9-14 July 2011, Orlando, Florida

- P02 2010 **Developing Techniques for Wearable Memory Rehearsal Devices: A New Method to Aid Memory Recalling**
Kiraz Candan Herdem
ASME 2010 World Conference on Innovative Virtual Reality (WINVR2010) 12-14 May 2010, Ames, IA
- P01 2010 **New Method for Robots: Learning to press Doorbell Buttons**
Kiraz Candan Herdem
HCI 575 Computer Perception Class Showcase, April 2010, Ames, IA
- _____ Technical Reports & Proposals
- TrP03 2013 **Emotion Detection and Affective Interface Design**
Kiraz Candan Herdem
Preliminary Exam Proposal, October 2013, Ames, IA
- TrP02 2010 **Long Term Object Possession**
Kiraz Candan Herdem
Psych 516 Advanced Cognition Class Research Proposal, Nov 2010, Ames, IA
- TrP01 2009 **Technology Solutions for People Suffering from Memory Problems: Alzheimer, Dementia, and Other Diseases**
Kiraz Candan Herdem
HCI 655 Class Project, December 2009, Ames, IA

Manuscripts

- _____ Patent Drafts
- 2009-2017 **An Apparatus and Method for Recognition of Values from User Activity**
Kiraz Candan Herdem
Patent Office: USPTO
- 2009-2017 **An Apparatus and Method for Emotion Centered Design**
Kiraz Candan Herdem
Patent Office: USPTO
- _____ Journal Papers
- 2019 – **HCI people design for user experiences.**
Kiraz Candan Herdem
Journal: Human – Computer Interaction, Taylor Francis
An analysis study on what HCI people do in design projects.
- 2019 – **HCI people are designers, but they are scientists, as well!**
Kiraz Candan Herdem
Journal: ACM ToCHI – ACM Transactions on Transactions on Computer-Human Interaction
An analysis study answering the question of “who are hci people/professionals”.
- 2019 – **Designers’ positions & functions in the new contextual settings of design projects**
Kiraz Candan Herdem

Journal: MIT Design Issues

An analysis study answering the question of “who are designers” when considered that HCI people do the design tasks.

Professional Membership

- 09/2014 – **Interaction Design Association – IxDA**
- 09/2009 – **ACM, Association for Computing Machinery**
- 2012 – **Systems group**
Professionals in the group, who are participated at Grace Hopper Celebration of Women in Computing Conference.

Talks

_____ Paper Talks

- 2014 **“Neural-Network Modeling of Bayesian Learning and Inference”**
Iowa State University, Ames, IA, USA
- 2011 **“Crowd sourcing: Why People Participate in These Studies?”**
Iowa State University, Ames, IA, USA
- 2010 **“ContraVision: Exploring Users' Reactions to Futuristic Technology”**
Iowa State University, Ames, IA, USA

_____ Research Talks

- 2011 **Color Perception**
Feb 25, 2011, Iowa State University, Ames, IA, USA
- 2010 **Wearable Memory Aid Technologies**
Iowa State University, Ames, IA, USA
- 2010 **Social Networking Site Design for Older Adults**
October 2010, Iowa State University, Ames, IA, USA
- 2010 **New Methods for Robots: Learning to Press Doorbell Buttons**
April 2010, Iowa State University, Ames, IA, USA
- 2010 **Data Mining with R: Exploring Global Terrorism Database**
April 2010, Iowa State University, Ames, IA, USA
- 2009 **External Memory Aid Devices**
December 2009, Iowa State University, Ames, IA, USA
- 2009 **Visual Representation of Informational Data Structures**
December 2009, Iowa State University, Ames, IA, USA

Services

____ Conference Organization

2006 **Organizing committee member, National E-signature Conference**

Ankara, Republic of Turkey

use of electronic signatures on online platforms

____ Departmental Tasks

2005 – 2009 **Committee Member, CEng Department, Gazi University**

Ankara, Republic of Turkey

a committee created for evaluating outcomes of industry oriented internship based on student reports.