Assoc. Prof. SANİYE TUĞBA TOKEL

Personal Information

Email: stugba@metu.edu.tr
Web: https://avesis.metu.edu.tr/stugba

International Researcher IDs
ScholarID: xsh4prUAAAAJ
ORCID: 0000-0002-2855-6452
Publons / Web Of Science ResearcherID: ABA-3122-2020
ScopusID: 55804102600
Yoksis Researcher ID: 165320

Education Information

Doctorate, Texas A&M University, United States Of America 2003 - 2008
Postgraduate, Middle East Technical University, Graduate School of Natural and Applied Sciences, Bilgisayar Ve Öğretim
Teknolojileri Eğitimi (Dr), Turkey 2001 - 2003
Undergraduate, Middle East Technical University, Faculty of Education, Department of Computer Education and
Instructional Technology, Turkey 1995 - 2001

Foreign Languages

English, C1 Advanced

Dissertations

Doctorate, Scaffolding Middle School Students' Content Knowledge and Ill-Structured Problem Solving in a Problem-
Based Hypermedia Learning Environment, Texas A&M University, 2008
Postgraduate, Communication Behaviors and Trust in Collaborative Online Teams, Middle East Technical University,
Graduate School of Natural and Applied Sciences, Bilgisayar Ve Öğretim Teknolojileri Eğitimi (Dr), 2003

Academic Titles / Tasks

Assistant Professor, Middle East Technical University, Faculty of Education, Department of Computer Education and
Instructional Technology, 2018 - Continues
Associate Professor, Middle East Technical University, Faculty of Education, Department of Computer Education and
Instructional Technology, 2018 - Continues
Assistant Professor, Middle East Technical University, Faculty of Education, Department of Computer Education and
Instructional Technology, 2008 - 2018

Academic and Administrative Experience

Vice Dean, Middle East Technical University, Faculty of Education, Department of Computer Education and Instructional

Technology, 2021 - 2022
Deputy Head of Department, 2011 - 2014

Advising Theses

TOKEL S. T., Analyzing teachers' views toward the use of eba during covid-19 pandemic based on the technology acceptance model, Postgraduate, C.KARAGÖZ(Student), 2022

TOKEL S. T., Secondary school students' programming and computational thinking skills: traditional and interdisciplinary approaches to teaching programming, Doctorate, R.ALTIN(Student), 2021

TOKEL S. T., Examining 10th grade students' problem-solving processes in geometry using eye tracking technology, Postgraduate, E.MALCI(Student), 2021

TOKEL S. T., Investigating the use of virtual worlds to teach basics of programming to children: A multiple case study, Doctorate, A.BATTAL(Student), 2018

TOKEL S. T., The Effect of flipped classroom as a teaching strategy on undergraduate students' self-efficacy, engagement and attitude in a computer programming course, Doctorate, C.Yurdagül(Student), 2018

TOKEL S. T., The effect of flipped classroom as a teaching strategy on undergraduate students' self-efficacy, engagement and attitude in a computer programming course, Doctorate, C.YURDAGÜL(Student), 2018

TOKEL S. T., Exploring the effectiveness of a mobile writing application for supporting handwriting acquisition of students with dysgraphia, Doctorate, S.HOPCAN(Student), 2017

TOKEL S. T., Exploring the use of 3D virtual worlds for psychoeducational groups: A multiple case study, Doctorate, A.GÜL(Student), 2016

TOKEL S. T., Facilitating english as a foreign language learners' vocabulary learning, task completion and contextual vocabulary exploration processes in a mobile supported situated learning environment, Doctorate, Ç.UZ(Student), 2016

TOKEL S. T., Supporting students' scientific argumentation in technology-enhanced learning environments: Distribution of scaffolds, Doctorate, H.HAVVA(Student), 2013

TOKEL S. T., Supporting students' scientific argumentation in technology-enhanced learning environments : distribution of scaffolds, Doctorate, H.Havva(Student), 2013

YILDIRIM İ. S., TOKEL S. T., Effects of scaffolding strategies embedded within web-based peer evaluation system on pre-service teachers' reflective thinking and self-efficacy, Doctorate, İ.YILDIZ(Student), 2012

TOKEL S. T., Students' experiences and perceptions of anxiety, motivation, and self-confidence in speaking english during task-based language learning activities in second life: The case of METU, Postgraduate, T.KAMALI(Student), 2012

TOKEL S. T., Effects of way finding affordances on usability of virtual world environments in terms of users' satisfaction, performance, and mental workload: Examination by eye-tracking and fnir device, Postgraduate, Y.CANSIZ(Student), 2012

Published journal articles indexed by SCI, SSCI, and AHCI

I.   **Exploring the effectiveness of a mobile writing application for supporting handwriting acquisition of students with dysgraphia**
Hopcan S., Tokel S. T.
EDUCATION AND INFORMATION TECHNOLOGIES, vol.26, no.4, pp.3967-4002, 2021 (SSCI)

II. **Facilitating Contextual Vocabulary Learning in a Mobile-Supported Situated Learning Environment**
Bilgin C. U., TOKEL S. T.
JOURNAL OF EDUCATIONAL COMPUTING RESEARCH, vol.57, no.4, pp.930-953, 2019 (SSCI)

III. **Acceptance of virtual worlds as learning space**
TOKEL S. T., Isler V.
INNOVATIONS IN EDUCATION AND TEACHING INTERNATIONAL, vol.52, no.3, pp.254-264, 2015 (SSCI)

IV. **Supporting problem-solving performance in a hypermedia learning environment: The role of students' prior knowledge and metacognitive skills**

TOKEL S. T., Pedersen S.

COMPUTERS IN HUMAN BEHAVIOR, vol.28, no.4, pp.1162-1169, 2012 (SSCI)

V. **Place presence, social presence, co-presence, and satisfaction in virtual worlds**

TOKEL S. T.

COMPUTERS & EDUCATION, vol.58, no.1, pp.154-161, 2012 (SCI-Expanded)

VI. **Scaffolding middle school students' content knowledge and ill-structured problem solving in a problem-based hypermedia learning environment**

Bulu S. T., Pedersen S.

ETR&D-EDUCATIONAL TECHNOLOGY RESEARCH AND DEVELOPMENT, vol.58, no.5, pp.507-529, 2010 (SSCI)

VII. **Communication behaviors and trust in collaborative online teams**

Bulu S. T., YILDIRIM Z.

EDUCATIONAL TECHNOLOGY & SOCIETY, vol.11, no.1, pp.132-147, 2008 (SSCI)

Articles Published in Other Journals

I. **Effects of Question Prompts in Web-Based Video Analysis System on Pre-service Teachers' Reflective Thinking**

YILDIZ İ., TOKEL S. T.

Kastamonu Eğitim Dergisi, vol.30, no.3, pp.645-656, 2022 (Peer-Reviewed Journal)

II. **The Views of Special Education Teachers about a Mobile Writing Application**

Hopcan S., Tokel S. T.

Research on Education and Psychology , vol.6, no.1, pp.84-100, 2022 (Peer-Reviewed Journal)

III. **The Effects of Mathematics on Programming Skills and its Retention: An Experimental Study**

Altın R., Tokel S. T., Delialioğlu Ö.

Journal of Computers in Mathematics and Science Teaching, vol.40, no.3, pp.183-199, 2021 (Peer-Reviewed Journal)

IV. **Investigating the factors affecting students' satisfaction in a programming course designed in 3d virtual worlds 3b sanal dünyalarda tasarlanan bir programlama dersinde öğrencilerin memnuniyetine etki eden faktörlerin incelenmesi**

Battal A., Tuğba Tokel S. T.

Turkish Online Journal of Qualitative Inquiry, vol.11, no.2, pp.218-246, 2020 (Scopus)

V. **Distributed Scaffolding: Synergy in Technology-Enhanced Learning Environments**

Ustunel H. H., TOKEL S. T.

TECHNOLOGY KNOWLEDGE AND LEARNING, vol.23, no.1, pp.129-160, 2018 (ESCI)

VI. **Anxiety, Motivation, and Self-Confidence in Speaking English During Task Based Activities in Second Life - Second Life Ortaminda Görev Temelli Dil Eğitimi Etkinliklerinde Öğrencilerin İngilizce Konuşmaya Yönelik Endişe, Güdülenme ve Özgüvenleri**

KAMALI ARSLANTAŞ T., TOKEL S. T.

Kastamonu Üniversitesi Kastamonu Eğitim Dergisi, vol.26, pp.287-296, 2018 (Peer-Reviewed Journal)

VII. **Teknoloji ile zenginleştirilmiş öğrenme ortamlarında öğrencilerin bilimsel argümantasyonuna rehberli öğrenme desteği sağlanması**

ÜSTÜNEL H. H., TOKEL S. T.

Ömer Halisdemir Üniversitesi İktisadi ve İdari Bilimler Fakültesi Dergisi, vol.10, pp.122-152, 2017 (Peer-Reviewed Journal)

VIII. **Exploring Internet addiction academic procrastination and general procrastination among Pre Service ICT teachers**

Tokel S. T.

Mevlana International Journal of Education, vol.4, no.1, pp.189-201, 2014 (Peer-Reviewed Journal)

IX. **Three Dimensional Virtual Worlds Research Trends and Future Directions**

TOKEL S. T., CEVİZCİ KARATAŞ E.

Mersin Üniversitesi Eğitim Fakültesi Dergisi, vol.10, pp.1-12, 2014 (Peer-Reviewed Journal)

X. **Türkiye'deki ebeveynlerin çocuklarının İnternet ve sosyal paylaşım siteleri kullanımına yönelik bilgi seviyeleri ve algıları**
Tokel S. T.
Mersin Üniversitesi Eğitim Fakültesi Dergisi, vol.9, no.1, pp.225-236, 2013 (Peer-Reviewed Journal)

Books & Book Chapters

I. **Exploring Affordances and Limitations of 3D Virtual Worlds in Psychoeducational Group Counseling**
Abdulmenaf G., Tokel S. T.
in: Handbook of Research on Implementing Digital Reality and Interactive Technologies to Achieve Society 5.0, Anna Osello,Francesca Maria Ugliotti, Editor, IGI Global, Pennsylvania, pp.96-120, 2022

II. **Design and Development of a Mobile Writing Application for Students With Dysgraphia**
Hopcan S., Tokel S. T., Karasu N., Aykut Ç.
in: Mobile Technologies in Educational Organizations, Alona Forkosh Baruch,Hagit Meishar Tal, Editor, IGI Global, Pennsylvania, pp.233-262, 2019

III. **3 Boyutlu Sanal Dünyaların Eğitimde Kullanımı**
GÖKTAŞ Y., TOPU F. B., ÇOBAN M., KARAKUŞ YILMAZ T., BAYDAŞ Ö., YILMAZ R. M., REİSOĞLU İ., TOKEL S. T., KOÇAK Ö.
Pegem Akademi, Ankara, 2017

IV. **3B Sanal Dünyalar ve Kullanım Alanları**
TOKEL S. T., TOPU F. B.
in: 3B Sanal Dünyaların Eğitimde Kullanımı, Göktaş Yüksel, Editor, Pegem, pp.1-24, 2017

V. **Üç Boyutlu Sanal Dünyalar**
Tokel S. T.
in: Öğretim Teknolojilerinin Temelleri Teoriler Araştırmalar Eğilimler, Çağıltay,K.,Göktaş,Y., Editor, Pegem A Yayıncılık, Ankara, pp.825-845, 2016

Refereed Congress / Symposium Publications in Proceedings

I. **The use of pair programming in education: A systematic Review**
Tunga Y., Tokel S. T.
EDUCCON 2018 Educational Conference, Ankara, Turkey, 27 - 28 September 2018, pp.19-29

II. **The use of pair programming in education: A systematic literature review**
TUNGA Y., TOKEL S. T.
EDUCCON 2018 Education Conference, Ankara, Turkey, 27 - 28 September 2018

III. **Engaging with the Scenario: Affect and Facial Patterns from a Scenario-Based Intelligent Tutoring System**
Nye B., Karumbaiah S., TOKEL S. T., Mark C., Giota S., Auerbach D., Kallirroi G.
19th International Conference on Artificial Intelligence in Education, 23 - 30 June 2018

IV. **Özel Eğitim Öğretmenlerinin Disgrafi Yaşayan Öğrenciler İçin Geliştirilen Mobil Yazma Uygulaması Hakkındaki Görüşleri**
HOPCAN S., TOKEL S. T.
International Computer Instructional Technologies Symposium, İzmir, Turkey, 2 - 04 May 2018

V. **Virtual Standardized Patients for Facilitating Conversational Medical Interview**
TOKEL S. T., Bautista M., Talbot T., Leeds A.
AECT 2017, 7 - 11 November 2017

VI. **Implications of 3D Virtual Worlds for Counseling Services In Higher Education**
GÜL A., AYDIN G., ÇAĞ P., TOKEL S. T.

IVnd International Eurasian Educational Research Congress, 11 - 14 May 2017

VII. **Investigating the effects of using virtual worlds in introductory programming education on students' problem solving skills**
BATTAL A., TOKEL S. T.
IVth International Eurasian Educational Research Congress, Denizli, Turkey, 11 - 14 May 2017

VIII. **Analyzing Learner Affect in a Scenario-Based Intelligent Tutoring System**
Nye B., Karumbaiah S., TOKEL S. T., Core M. G., Stratou G., Auerbach D., Georgila K.
18th International Conference on Artificial Intelligence in Education (AIED), Wuhan, China, 28 June - 01 July 2017, vol.10331, pp.544-547

IX. **Analyzing Learner Affect in a Scenario-Based Intelligent Tutoring Syste**
Nye B., Karumbaiah S., TOKEL S. T., Core M. G., Stratou G., Auerbach D., Kallirroi G.
Artificial Intelligence in Education 2017 (AIED), 28 June - 02 July 2017, vol.10331, pp.544-547

X. **Design Report of Geography Island Project: Description of Environment and Instructional Elements**
KEFELİ P., İLKHAN M., GÜLEÇ M., TOKEL S. T.
ICITS 2016, Rize, Turkey, 16 - 18 May 2016, pp.387-396

XI. **Development of a Virtual Learning Environment Hittites Empire**
KİLİS S., ALKIŞ Y., KADIRHAN Z., ÇETİNKAYA H. H., ÖZGENEL Ç. F., TOKEL S. T.
5th European Immersive Education Summit (EiED 2015), 9 - 11 September 2015

XII. **Comparing Two Open Source Virtual Worlds In Terms Of Educational Purposes: OpenSim And Open Wonderland**
BATTAL A., TOKEL S. T.
7th ICITS International Computer and Instructional Technologies Symposium, Turkey, 6 - 09 June 2013

XIII. **Üç Boyutlu Sanal Dünyalar: Eğitimciler İçin Yol Haritası**
TOKEL S. T., CEVİZCİ KARATAŞ E., GÜL A.
Akademik Bilişim 2013, Turkey, 23 - 25 January 2013

XIV. **FOREIGN LANGUAGE EDUCATION IN VIRTUAL WORLDS: A REVIEW OF PERVASIVE STUDIES**
TOKEL S. T., Kamali T.
4th International Conference on Education and New Learning Technologies (EDULEARN), Barcelona, Spain, 2 - 04 July 2012, pp.4349-4358

XV. **Effects of Way Finding Affordances on Usability of Virtual World Environments in Terms of Users' Satisfaction, Performance, and Mental Workload: Examination by Eye-Tracking and fNIR**
CANSIZ Y., TOKEL S. T.
Proceedings of World Conference on Educational Multimedia, Hypermedia and Telecommunications 2012, 26 - 29 June 2012, pp.1073-1079

XVI. **3D learning environment for "conscious individuals & livable environment for elementary students**
KAMALI ARSLANTAŞ T., CEVİZCİ KARATAŞ E., Leymun C., TOKEL S. T.
5th International Computer & Instructional Technologies Symposium, Turkey, 1 - 03 June 2011

XVII. **Second Life ODTÜ Kampüsü**
TOKEL S. T., İŞLER V.
Akademik Bilişim 2011, Turkey, 2 - 04 February 2011

XVIII. **Virtual Environments for Learning: The Design Model**
TOKEL S. T., PEDERSEN S.
Proceedings of World Conference on Educational Multimedia, Hypermedia and Telecommunications 2007, 25 - 28 June 2007

XIX. **Teachers' beliefs underlying their assessment practices in a problem-based learning activity**
TOKEL S. T., Pedersen S.
Proceedings of the World Conference on Educational Multimedia, Hypermedia and Telecommunications, 25 - 28 June 2004

Supported Projects

TOKEL S. T., Project Supported by Higher Education Institutions, FEN BİLİMLERİ ENSTİTÜSÜ/LİSANSÜSTÜ TEZ PROJESİ, 2014 - 2016

TOKEL S. T., Project Supported by Higher Education Institutions, Second Life Sanal Ortamında Odtü. Ek Kampüsü Ve Böte Bölümü Geliştirilmesi Projesi., 2012 - 2012

TOKEL S. T., Project Supported by Higher Education Institutions, Second Life Sanal Ortamında Odtü Ek Kampüsü Ve Böte Bölümü Geliştirilmesi Projesi, 2010 - 2010

Memberships / Tasks in Scientific Organizations

TEMEG, Executive Board Member, 2020 - Continues, Turkey

Metrics

Publication: 42
Citation (WoS): 346
Citation (Scopus): 405
H-Index (WoS): 6
H-Index (Scopus): 7

Non Academic Experience

Metaverse Yazılım Blişim Tic. Ltd. Şti
METU
University of Southern California - Institute for Creative Technologies
Computer Education and Instructional Technology-METU
Department of Educational Psychology-Texas A&M University
Computer Education and Instructional Technology-METU
Educational Media Services (EdMS) Texas A&M University Lib.
Learning to Teach with Technology Studio-Indiana University
Meteksan Systems and Computer Technologies