

Prof. SENAR TEMEL

Personal Information

Office Phone: [+90 312 780 6787](tel:+903127806787)

Email: senar@hacettepe.edu.tr

Web: <https://avesis.hacettepe.edu.tr/senar>

International Researcher IDs

ORCID: 0000-0001-6050-4794

Publons / Web Of Science ResearcherID: GCP-1259-2022

Yoksis Researcher ID: 113434

Education Information

Doctorate, Hacettepe University, Fen Bilimleri Enstitüsü, Ofma , Turkey 2004 - 2009

Undergraduate, Hacettepe University, Eğitim Fakültesi, Kimya Eğitimi, Turkey 1998 - 2004

Foreign Languages

English, C1 Advanced

Research Areas

Social Sciences and Humanities, Education, Teacher Training, Teacher Training in Science and Math. at Second. Sch. Lev.

Academic Titles / Tasks

Professor, Hacettepe University, Eğitim Fakültesi, Matematik ve Fen Bilimleri Eğitimi Bölümü, 2022 - Continues

Associate Professor, Hacettepe University, Eğitim Fakültesi, Matematik ve Fen Bilimleri Eğitimi Bölümü, 2017 - Continues

Published journal articles indexed by SCI, SSCI, and AHCI

- I. **Knowledge, Attitudes and Behaviours towards the Environmental Issues: Case of Northern Cyprus**
VAROĞLU L., TEMEL S., YILMAZ A.
J. Math., Sci Tech. Ed, 2018 (SSCI)
- II. **The development of the nature of science view scale (NOSvs) at university level**
TEMEL S., ŞEN Ş., ÖZCAN Ö.
RESEARCH IN SCIENCE & TECHNOLOGICAL EDUCATION, vol.36, no.1, pp.55-68, 2018 (SSCI)
- III. **VALIDITY AND RELIABILITY ANALYSES FOR THE NATURE OF SCIENCE INSTRUMENT SECONDARY (NOSI-S)**
TEMEL S., ŞEN Ş., ÖZCAN Ö.
JOURNAL OF BALTIC SCIENCE EDUCATION, vol.16, no.3, pp.429-437, 2017 (SSCI)
- IV. **The Analysis of Prospective Chemistry Teachers' Cognitive Structure: The Subject of Covalent and Ionic Bonding**

TEMEL S., ÖZCAN Ö.

EURASIA JOURNAL OF MATHEMATICS SCIENCE AND TECHNOLOGY EDUCATION, vol.12, no.8, pp.1953-1969, 2016 (SSCI)

V. VALIDITY AND RELIABILITY ANALYSES FOR CHEMISTRY SELF-CONCEPT INVENTORY

TEMEL S., ŞEN Ş., YILMAZ A.

JOURNAL OF BALTIC SCIENCE EDUCATION, vol.14, no.5, pp.599-606, 2015 (SSCI)

VI. The effects of problem-based learning on pre-service teachers' critical thinking dispositions and perceptions of problem-solving ability

Temel S.

SOUTH AFRICAN JOURNAL OF EDUCATION, vol.34, no.1, 2014 (SSCI)

VII. FUNDAMENTAL ELEMENTS OF PROBLEM SOLVING PROCESS: METACOGNITIVE SELF-REGULATION STRATEGIE AND SELF-EFFICACY

Temel S.

HACETTEPE UNIVERSITESI EGITIM FAKULTESI DERGISI-HACETTEPE UNIVERSITY JOURNAL OF EDUCATION, pp.190-199, 2012 (SSCI)

VIII. The effect of web-based worksheets usage on students' academic success, logical thinking skills and attitudes towards chemistry in the teaching of redox topic within chemistry education

Seyhan H. G., TEMEL S., Morgil I.

ENERGY EDUCATION SCIENCE AND TECHNOLOGY, vol.21, pp.91-107, 2008 (SCI-Expanded)

Articles Published in Other Journals

I. Prospective Teachers' Views on the Concept of Renewable Energy

ŞEN Ş., TEMEL S.

Buca Eğitim Fakültesi Dergisi, no.56, pp.607-625, 2023 (Peer-Reviewed Journal)

II. An Examination of University Students' Views of the Nature of Science Based on Their Epistemological Beliefs

Ozgur S. D., TEMEL S.

YUKSEKOGRETİM DERGISI, vol.11, no.2, pp.438-444, 2021 (ESCI)

III. The Examination of Prospective Chemistry and Physics Teachers' Cognitive Structure Related to Quantum Numbers

TEMEL S., ÖZCAN Ö.

JOURNAL OF QUALITATIVE RESEARCH IN EDUCATION-EGITIMDE NİTEL ARASTIRMALAR DERGISI, vol.8, no.2, pp.649-664, 2020 (ESCI)

IV. THE STUDY OF RELATIONSHIP BETWEEN PRE-SERVICE TEACHERS' SELF-EFFICACY BELIEFS AND ATTITUDES TOWARDS THE TEACHING PROFESSION

Şen Ş., Temel S.

MIER-JOURNAL OF EDUCATIONAL STUDIES TRENDS AND PRACTICES, vol.9, no.1, pp.23-32, 2019 (ESCI)

V. The study of relationship between pre-service teachers' self-efficacy beliefs and attitudes towards the teaching profession

Şen Ş., Temel S.

MIER-JOURNAL OF EDUCATIONAL STUDIES TRENDS AND PRACTICES, vol.9, no.1, pp.23-32, 2019 (ESCI)

VI. Üstbilişsel Etkinlik Envanteri: Geçerlik ve Güvenirlik Çalışması

DİNÇOL ÖZGÜR S., TEMEL S., YILMAZ A.

Karaelmas Fen ve Mühendislik Dergisi, vol.8, pp.618-625, 2018 (Peer-Reviewed Journal)

VII. An analysis of prospective chemistry teachers cognitive structures through flow map method The subject of oxidation and reduction

TEMEL S.

Asia-Pasific Forum on Science Learning and Teaching, vol.17, 2016 (Peer-Reviewed Journal)

VIII. Examination of relationships between preservice teachers confidence in technological pedagogical

content knowledge and learning strategies

ŞEN Ş., TEMEL S.

Mediterranean Journal of Educational Research, vol.19, pp.53-60, 2016 (Peer-Reviewed Journal)

- IX. **Adaptation of the Attitude toward the Subject of Chemistry Inventory ASCI into Turkish**
ŞEN Ş., YILMAZ A., TEMEL S.
Journal of Education and Training Studies, vol.4, pp.27-33, 2016 (Peer-Reviewed Journal)
- X. **Fen eğitiminde probleme dayalı öğrenme ile ilgili yapılan çalışmalara ilişkin bir içerik analizi TÜRKİYE Örneği**
TEMEL S., ŞEN Ş., YILMAZ A.
KASTAMONU EĞİTİM DERGİSİ, vol.23, pp.565-580, 2015 (Peer-Reviewed Journal)
- XI. **Fen eğitiminde probleme dayalı öğrenme ile ilgili yapılan çalışmalara ilişkin bir içerik analizi: Türkiye örneği**
TEMEL S., ŞEN Ş., YILMAZ A.
Kastamonu Üniversitesi Kastamonu Eğitim Dergisi, vol.23, no.2, pp.565-580, 2015 (Peer-Reviewed Journal)
- XII. **Fen Eğitiminde Probleme Dayalı Öğrenme İle ilgili Yapılan Çalışmalara İlişkin Bir İçerik Analizi:Türkiye Örneği**
TEMEL S., ŞEN Ş., YILMAZ A.
Kastamonu Eğitim Dergisi, 2014 (Peer-Reviewed Journal)
- XIII. **Kimya Laboratuvarında Problem Çözme Uygulamaları**
TEMEL S., MORGİL İ.
Pamukkale Üniversitesi Eğitim Fakültesi Dergisi,, vol.33, pp.39-52, 2013 (Peer-Reviewed Journal)
- XIV. **Use of the Learning Cycle Model in the Teaching of Chemical Bonding and an Investigation of Diverse Variables in Prediction of Achievement**
TEMEL S., YILMAZ A., DİNÇOL ÖZGÜR S.
International Journal of Education and Research, vol.1, pp.41-54, 2013 (Peer-Reviewed Journal)
- XV. **Prospective Chemistry Teachers Problem Solving Achievement According To Their Levels of Metacognitive Skills**
TEMEL S.
Problems of Education in the 21st Century, vol.51, pp.126-131, 2013 (ESCI)
- XVI. **The Effects of Problem Based Learning On Self Regulated Learning Skills and The Variables Predictive of These Skills**
TEMEL S.
Mediterranean Journal of Social Sciences, vol.4, pp.297-302, 2013 (Scopus)
- XVII. **Problem Solving Applications in Chemistry Laboratory**
TEMEL S., Morgil I.
PAMUKKALE UNIVERSİTESİ EĞİTİM FAKÜLTESİ DERGİSİ-PAMUKKALE UNIVERSITY JOURNAL OF EDUCATION, no.33, pp.39-52, 2013 (ESCI)
- XVIII. **The effects of different types of test on preservice chemistry teachers' achievement related to 'chemical bonding'**
TEMEL S., DİNÇOL ÖZGÜR S., YILMAZ A.
Problems of Education in the 21th Century, vol.41, pp.123-129, 2012 (Peer-Reviewed Journal)
- XIX. **Öğrenme Halkası Modelinin Öğretmen Adaylarının Yükseltgenme İndirgenme Konusunda Anlama Düzeylerine ve Düşünme Becerilerine Etkisi**
TEMEL S., DİNÇOL ÖZGÜR S., YILMAZ A.
NECATİBEY EĞİTİM FAKÜLTESİ ELEKTRONİK FEN VE MATEMATİK EĞİTİMİ DERGİSİ, vol.6, pp.287-305, 2012 (Peer-Reviewed Journal)
- XX. **Determination of Preservice Chemistry Teachers Cognitive Structures as Relevant to Their Conceptual Understandings and Misconceptions of Greenhouse Gases and Their Effects**
ÖZYALÇIN OSKAY Ö., TEMEL S., DİNÇOL ÖZGÜR S., ERDEM E.
Eurasian Journal of Physics and Chemistry Education, vol.4, pp.30-55, 2012 (Peer-Reviewed Journal)
- XXI. **THE EFFECT OF DIFFERENT TYPES OF TEST ON PRESERVICE CHEMISTRY TEACHERS' ACHIEVEMENT**

RELATED TO "CHEMICAL BONDING"

TEMEL S., Ozgur S. D., YILMAZ A.

PROBLEMS OF EDUCATION IN THE 21ST CENTURY, vol.41, pp.123-129, 2012 (ESCI)

- XXII. **Determination of Preservice Chemistry Teachers Cognitive Structures via Flow Map Method and Their Knowledge Level on Greenhouse Gases and Their Effects Topic**

ÖZYALÇIN OSKAY Ö., TEMEL S., DİNÇOL ÖZGÜR S., ERDEM E.

Eurasian Journal of Physics and Chemistry Education, vol.4, pp.30-45, 2012 (Peer-Reviewed Journal)

- XXIII. **THE EFFECT OF WEB-BASED PROJECT APPLICATIONS ON STUDENTS' ATTITUDES TOWARDS CHEMISTRY**

Morgil I., Gungor Seyhan H., Ural Alsan E., TEMEL S.

TURKISH ONLINE JOURNAL OF DISTANCE EDUCATION, vol.9, no.2, pp.220-237, 2008 (ESCI)

- XXIV. **Kimya Eğitiminde Laboratuarda Problem Çözme Uygulamasının Öğrencilerin Bilimsel Süreç Becerilerine ve Mantıksal Düşünme Yeteneklerine Etkisi**

TEMEL S., İNCİ M.

Buca Eğitim Fakültesi Dergisi, vol.22, pp.89-97, 2007 (Peer-Reviewed Journal)

Books & Book Chapters

- I. **Project- Based Learning in Environmental Education**

TEMEL S., YILMAZ A., ÖZYALÇIN OSKAY Ö., DİNÇOL ÖZGÜR S.

Scholars Press, 2014

Refereed Congress / Symposium Publications in Proceedings

- I. **Understanding of sustainable development in terms of environmental ethics: A qualitative study**

ŞEN Ş., TEMEL S.

12th World Conference on Educational Sciences (WCES-2020), İstanbul, Turkey, 06 June 2020, vol.7, pp.186-193

- II. **Prospective teachers' understanding of sustainable development concept: A qualitative study**

TEMEL S., ŞEN Ş.

12th World Conference on Educational Sciences (WCES-2020), İstanbul, Turkey, 06 June 2020, vol.7, pp.169-177

- III. **Comprehension levels of prospective teachers related to the heat and temperature concepts**

TEMEL S., ŞEN Ş.

Turkish Physical Society 35th International Physics Congress, Bodrum, Turkey, 4 - 08 September 2019

- IV. **Preservice teachers' cognitive structures related to heat and temperature concepts**

ŞEN Ş., TEMEL S.

Turkish Physical Society 35th International Physics Congress, Bodrum, Turkey, 4 - 08 September 2019

- V. **Prospective teachers' understanding of environmental ethics approach: A qualitative study**

TEMEL S.

ERPA International Congresses on Education (ERPA), Sakarya, Turkey, 19 - 22 June 2019, vol.66

- VI. **Examination of relationship between preservice chemistry teachers' preferences for creating constructivist-learning environment and sense of efficacy**

TEMEL S.

ERPA International Congresses on Education (ERPA), Sakarya, Turkey, 19 - 22 June 2019, vol.66

- VII. **Kimya Öğretmen Adaylarının Sürdürülebilir Kalkınma Konusu İle İlgili Bilişsel Yapıları**

DİNÇOL ÖZGÜR S., TEMEL S.

EJERCONGRESS 2018 Conference Proceedings, 2 - 05 May 2018

- VIII. **Students' understanding of quantum numbers: A qualitative study**

TEMEL S., ÖZCAN Ö.

ERPA- International Congresses on Education, 28 June 2019 - 01 July 2018

- IX. **Prospective Chemistry Teachers' Cognitive Structures about the Concept of Globalization**
ŞEN Ş., DİNÇOL ÖZGÜR S., TEMEL S.
ERPA 2018 International Congresses on Education, 28 June - 01 July 2018
- X. **Knowledge, attitudes, behaviours towards the environmental issues: Sample of Northern Cyprus**
VAROĞLU L., TEMEL S., YILMAZ A.
International Conference on Environmental Educational Sciences Studies, 18 - 20 October 2017
- XI. **The Effect of Different Metacognitive Skill Levels on Preservice Chemistry Teachers Confidence in Technological Pedagogical Content Knowledge**
ŞEN Ş., TEMEL S.
III. International Dynamic, Explorative and Active Learning (IDEAL) Conference, 1 - 03 September 2016, pp.42-52
- XII. **Perceived problem solving skills As a predictor of prospective teachers scientific epistemological beliefs**
TEMEL S.
8th World Conference on Educational Sciences, 4 - 06 February 2016, vol.11, pp.111-118
- XIII. **An Analysis of Prospective Chemistry Teachers Attitudes towards Information and Communication Technologies and of Their Confidence in Technological and Pedagogical Content Knowledge**
ŞEN Ş., TEMEL S.
II. International Dynamic, Explorative and Active Learning (IDEAL) Conference, Turkey, 5 - 07 November 2015, pp.1-10
- XIV. **Kimya Dersine Yönelik Tutum Envanterinin Türkçeye Uyarlama Çalışması**
ŞEN Ş., YILMAZ A., TEMEL S.
UKEK 2015, Turkey, 7 - 10 September 2015
- XV. **Ein projektbasiertes Lernmodell: Umweltprojekte: Eine Inhaltsanalyse**
TEMEL S., DİNÇOL ÖZGÜR S., YILMAZ A.
GDCh-2014, 15 - 18 September 2014
- XVI. **Öğrenme Halkası Modelinin Öğrencilerin Başarılarına Etkisi: Bloom Taksonomisi**
TEMEL S., DİNÇOL ÖZGÜR S., ÖZYALÇIN OSKAY Ö.
X. Ulusal Fen Bilimleri ve Matematik Eğitimi Kongresi, Turkey, 27 - 30 June 2012
- XVII. **The examination of metacognitive skill levels and usage of learning strategies of preservice chemistry teachers**
TEMEL S., OZGUR S. D., ŞEN Ş., YILMAZ A.
4th World Conference on Educational Sciences (WCES), Barcelona, Spain, 2 - 05 February 2012, vol.46, pp.1445-1449
- XVIII. **The effect of learning styles of preservice chemistry teachers on their perceptions of problem solving skills and problem solving achievements**
OZGUR S. D., TEMEL S., YILMAZ A.
4th World Conference on Educational Sciences (WCES), Barcelona, Spain, 2 - 05 February 2012, vol.46, pp.1450-1454
- XIX. **Metacognition und Problemlösen**
TEMEL S., DİNÇOL ÖZGÜR S., YILMAZ A.
GDCh-Wissenschaftsforum Chemie 2011, 4 - 07 September 2011
- XX. **Öğrenme halkası modelinin kimya öğretmen adaylarının alt ve üst düzey düşünme becerilerine etkisi**
TEMEL S., DİNÇOL ÖZGÜR S., YILMAZ A.
II. Ulusal Kimya Eğitimi Kongresi, Turkey, 5 - 08 July 2011
- XXI. **The effect of matching learning styles with teaching styles on success**
Dincol S., TEMEL S., Oskay O. O., ERDOĞAN Ü. I., YILMAZ A.
3rd World Conference on Educational Sciences (WCES), İstanbul, Turkey, 3 - 07 February 2011, vol.15, pp.854-858

Supported Projects

TEMEL S., ÖZCAN Ö., Project Supported by Higher Education Institutions, Kimya Öğretmen Adaylarının Kovalent ve İyonik Bağlar ile İlgili Zihinsel Modellerinin Araştırılması, 2016 - 2017

TEMEL S., Project Supported by Higher Education Institutions, Problem çözme becerisi algısı öğretmen adaylarının bilimsel epistemolojik inançlarını yordayıcı bir değişken, 2015 - 2016

ŞEN Ş., YILMAZ A., TEMEL S., Project Supported by Higher Education Institutions, Kimya Dersine Yönelik Tutum Envanterinin Türkçeye Uyarlama Çalışması, 2015 - 2015

Metrics

Publication: 54

Citation (WoS): 49

Citation (Scopus): 73

H-Index (WoS): 4

H-Index (Scopus): 4

Non Academic Experience

Hacettepe Üniversitesi