

## Assoc. Prof. SİNAN TEMEL

### Personal Information

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### International Researcher IDs

ScholarID: vqJ8tUoAAAAJ

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Publons / Web Of Science ResearcherID: IYS-5553-2023

ScopusID: 36931121300

Yoksis Researcher ID: 26837

### Education Information

Doctorate, Eskisehir Osmangazi University, Fen Bilimleri Enstitüsü, Fizik (Dr), Turkey 2010 - 2015

Postgraduate, Eskisehir Osmangazi University, Fen Bilimleri Enstitüsü, Fizik (YI) (Tezli), Turkey 2007 - 2010

Undergraduate, Eskisehir Osmangazi University, Fen-Edebiyat Fakültesi, Fizik Bölümü, Turkey 2003 - 2007

### Dissertations

Doctorate, (MgO)<sub>x</sub>(ZnO)<sub>1-x</sub> ince filmlerinin üretimi ve karakterizasyonu, Eskisehir Osmangazi University, Fen Bilimleri Enstitüsü, Fizik (Dr), 2015

Postgraduate, Özel bir Termiyonik Vakum Ark (TVA) tekniği kullanılarak gözlük camlarına bazı kaplamaların yapılması ve fiziksel özelliklerinin incelenmesi, Eskisehir Osmangazi University, Fen Bilimleri Enstitüsü, Fizik (YI) (Tezli), 2010

### Research Areas

Physics, Electronic and magnetic devices, microelectronics, Physical Chemistry, Materials Science, Surfaces, Interfaces, Thin Films and Nanosystems, Electrical properties of electronic structures, interfaces, thin films and low-dimensional structures, Optical Properties, Spectroscopy of Matter

### Academic Titles / Tasks

Associate Professor, Bilecik Seyh Edebali University, Fen Fakültesi, Fizik, 2021 - Continues

Assistant Professor, Bilecik Seyh Edebali University, Meslek Yüksekokulu, Elektrik Ve Enerji, 2015 - 2021

Expert, Bilecik Seyh Edebali University, Rektörlük, Merkezi Araştırma Laboratuvarı Uygulama ve Araştırma Merkezi, 2011 - 2015

### Academic and Administrative Experience

Member of the Senate, Bilecik Seyh Edebali University, 2020 - Continues

Director of Vocational School, Bilecik Seyh Edebali University, Gölpazarı Meslek Yüksekokulu, 2020 - Continues

Director of the Center, Bilecik Seyh Edebali University, Rektörlük, Merkezi Araştırma Laboratuvarı Uygulama Ve Araştırma Merkezi, 2019 - 2022

Deputy Director of the Center, Bilecik Seyh Edebali University, Rektörlük, Merkezi Araştırma Laboratuvarı Uygulama Ve Araştırma Merkezi, 2017 - 2019

## Courses

İleri Katıhal Fiziği, Postgraduate, 2023 - 2024

Güneş Enerjisi Teknolojisi, Postgraduate, 2023 - 2024, 2022 - 2023

Yarı İletken Teknolojisi, Doctorate, 2023 - 2024, 2022 - 2023

Yarıiletken Fiziği, Postgraduate, 2020 - 2021, 2019 - 2020, 2018 - 2019

İnce Film Üretim ve Karakterizasyon Teknikleri, Postgraduate, 2020 - 2021, 2019 - 2020, 2018 - 2019, 2017 - 2018, 2016 - 2017

Fizik 1, Undergraduate, 2020 - 2021, 2019 - 2020, 2018 - 2019, 2017 - 2018, 2016 - 2017, 2015 - 2016

Tez Çalışması, Postgraduate, 2020 - 2021

Uzmanlık Alan, Postgraduate, 2020 - 2021

Fizik 2, Undergraduate, 2019 - 2020, 2018 - 2019, 2017 - 2018, 2016 - 2017, 2015 - 2016

Katıların Bant Teorisi, Postgraduate, 2019 - 2020, 2018 - 2019, 2017 - 2018, 2016 - 2017

Kristal Yapı Tayini, Postgraduate, 2019 - 2020

## Advising Theses

Temel S., Gökmen F. Ö., Katkılı/katkısız metal oksit (MO) nanopartikül (NP) üretimi ve bazı fiziksel özelliklerinin incelenmesi, Postgraduate, F.ERGÜL(Student), Continues

Temel S., Gökmen F. Ö., Fotovoltaik Uygulamalarda Kullanılmak Üzere Katkılı Ve Katkısız Yarıiletken İnce Filmlerin Üretilmesi, Postgraduate, O.ÖZDEMİR(Student), 2023

Temel S., Fotovoltaik hücrelerde kullanılan zno nanorodların üretilmesi ve bazı fiziksel özelliklerin incelenmesi, Postgraduate, E.ARSLAN(Student), 2022

Temel S., Yaman E., Biyokütleden üretilen karbonlu malzemeler üzerine ZnO ince filmlerin biriktirilmesi ve karakterizasyonu, Postgraduate, A.AŞMA(Student), 2021

Temel S., Özbay N., Katkılı metal oksit ince filmlerin üretimi ve bazı fiziksel özelliklerinin incelenmesi, Doctorate, M.FATİH(Student), 2020

## Published journal articles indexed by SCI, SSCI, and AHCI

- I. **Photovoltaic performance in CIGS solar cells: effects of using Mg- and Al-doped ZnO thin-film layers as alternative TCO and front contact layer**  
Gozukizil M. F., Nayman E., Temel S., Gokmen F. O.  
JOURNAL OF MATERIALS SCIENCE-MATERIALS IN ELECTRONICS, vol.35, no.30, pp.1-9, 2024 (SCI-Expanded)
- II. **Comparison of gas sensing performances in various yarn types coated with polyaniline**  
Gozukizil M. F., Nayman E., Temel S., Gokmen F. O.  
JOURNAL OF MATERIALS SCIENCE: MATERIALS IN ELECTRONICS, vol.35, pp.1-22, 2024 (SCI-Expanded)
- III. **Comparison of gas sensor properties by producing ZnO thin films with different techniques**  
TEMEL S., Gözükizil F., GÖKMEN F. Ö., YAMAN E.  
Journal of Optoelectronics and Advanced Materials, vol.25, no.5-6, pp.282-288, 2023 (SCI-Expanded)
- IV. **Nano SiO<sub>2</sub> doping effect on physicochemical properties of PVA-starch bionanocomposite films**  
GÖZÜKİZİL M. F., TEMEL S., YAMAN E., GÖKMEN F. Ö.  
Phosphorus, Sulfur and Silicon and the Related Elements, vol.198, no.4, pp.366-373, 2023 (SCI-Expanded)

- V. **Evaluation of bio-char as porous catalyst support in the pyrolysis of Brassica napus subsp. napus cake**  
YAMAN E., GÖKMEN F. Ö., TEMEL S., ÖZBAY N.  
Journal of Porous Materials, vol.29, no.3, pp.771-781, 2022 (SCI-Expanded)
- VI. **Eco-friendly polyacrylic acid based porous hydrogel for heavy metal ions adsorption: characterization, adsorption behavior, thermodynamic and reusability studies**  
GÖKMEN F. Ö., YAMAN E., TEMEL S.  
Microchemical Journal, vol.168, 2021 (SCI-Expanded)
- VII. **Antibacterial activity of ZnO nanoflowers deposited on biodegradable acrylic acid hydrogel by chemical bath deposition**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
Bulletin of Materials Science, vol.43, no.1, 2020 (SCI-Expanded)
- VIII. **Synthesis, characterization and adsorption studies of nano-composite hydrogels and the effect of SiO<sub>2</sub> on the capacity for the removal of Methylene Blue dye**  
TEMEL S., YAMAN E., ÖZBAY N., GÖKMEN F. Ö.  
Journal of the Serbian Chemical Society, vol.85, no.7, pp.939-952, 2019 (SCI-Expanded)
- IX. **Optical band gap engineering of (MgO)<sub>x</sub>(ZnO)<sub>1-x</sub> films deposited by sol-gel spin coating**  
TEMEL S., Nebi M., PEKER D.  
Optoelectronics and Advanced Materials, Rapid Communications, vol.12, no.1-2, pp.76-79, 2018 (SCI-Expanded)
- X. **Influence of deposition temperature on structural, morphological, and optical properties of ZnS thin films**  
TEMEL S.  
Canadian Journal of Physics, vol.96, no.7, pp.826-830, 2018 (SCI-Expanded)
- XI. **Boron undoped and doped europium-bismuth oxide nanocomposites via the polymeric precursor technique**  
AYTİMUR A., Koçyiğit S., TEMEL S., Uslu I.  
JOM, vol.66, no.8, pp.1479-1484, 2014 (SCI-Expanded)
- XII. **Structural investigation of boron undoped and doped indium stabilized bismuth oxide nanoceramic powders**  
Koçyiğit S., Gökmen Ö., TEMEL S., AYTİMUR A., Uslu I., Haman Bayarı S.  
Ceramics International, vol.39, no.7, pp.7767-7772, 2013 (SCI-Expanded)
- XIII. **The structural, optical and morphological properties of CaF<sub>2</sub> thin films by using Thermionic Vacuum Arc (TVA)**  
ÇETİN N., KORKMAZ Ş., Elmas S., Ekem N., PAT S., BALBAĞ M. Z., Tarhan E., TEMEL S., Özmumcu M.  
Materials Letters, vol.91, pp.175-178, 2013 (SCI-Expanded)
- XIV. **Thermal treatment effect on the optical properties of ZrO<sub>2</sub> thin films deposited by thermionic vacuum arc**  
KORKMAZ Ş., PAT S., Ekem N., Zafer Balbağ M., TEMEL S.  
Vacuum, vol.86, no.12, pp.1930-1933, 2012 (SCI-Expanded)
- XV. **Diamond-like carbon coated on polyethylene terephthalate by Thermionic Vacuum Arc**  
PAT S., TEMEL S., Ekem N., KORKMAZ Ş., Özkan M., BALBAĞ M. Z.  
Journal of Plastic Film and Sheeting, vol.27, no.1-2, pp.127-137, 2011 (SCI-Expanded)
- XVI. **Optical band gap studies on Cu-doped Zinc-Borate glassy thin films**  
KILIÇ G., PAT S., BALBAĞ M. Z., TEMEL S., KORKMAZ Ş., Ekem N.  
Optoelectronics and Advanced Materials, Rapid Communications, vol.4, no.11, pp.1705-1708, 2010 (SCI-Expanded)

## Articles Published in Other Journals

- I. **Mechanical, Thermal and Biodegradable Behavior Properties of Nano SiO<sub>2</sub> Doped Polyhydroxyethylmethacrylate (PHEMA) Films**

TEMEL S., YAMAN E., gözükcül m. f., GÖKMEN F. Ö.

Food and Health, vol.9, no.2, pp.117-128, 2023 (Peer-Reviewed Journal)

- II. **Production of Porous Carbon Materials From Biomass: The Effect of Biomass Type and Temperature on Physiochemical Properties**  
AŞMA A., YAMAN E., TEMEL S.  
Konya mühendislik bilimleri dergisi (Online), vol.11, no.1, pp.261-273, 2023 (Peer-Reviewed Journal)
- III. **DEPOSITION AND CHARACTERIZATION OF ZNO THIN FILMS ON CARBON SUBSTRATE PRODUCED FROM BIOMASS**  
AŞMA A., YAMAN E., TEMEL S.  
Eskişehir Osmangazi Üniversitesi mühendislik ve mimarlık fakültesi dergisi (online), vol.29, no.3, pp.431-439, 2021 (Peer-Reviewed Journal)
- IV. **Değerli Metal Katalizörlerde Katalizör Destek Malzemesi Olarak Biyotabanlı Malzemelerin Üretilmesi ve Karakterizasyonu**  
YAMAN E., GÖKMEN F. Ö., TEMEL S., ÖZBAY N., ÖZSİN G.  
Avrupa Bilim ve Teknoloji Dergisi, vol.23, pp.181-188, 2021 (Peer-Reviewed Journal)
- V. **Production and Characterization of Al-Doped ZnO Thin Films with Sol-Gel Magnetic Spin Coating Technique**  
GÖZÜKIZIL M. F., TEMEL S., ÖZBAY N.  
Sakarya Üniversitesi Fen Bilimleri Enstitüsü Dergisi, vol.24, no.1, pp.172-177, 2020 (Peer-Reviewed Journal)
- VI. **Investigation of Structural and Morphological Properties of ZnO Nanoflowers on Biocompatible Polymeric Substrate**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
ACADEMIC PLATFORM-JOURNAL OF ENGINEERING AND SCIENCE, vol.8, no.1, pp.36-40, 2020 (Peer-Reviewed Journal)
- VII. **SOME PHYSICAL PROPERTIES OF CZO THIN FILMS PRODUCED BY A NOVEL MAGNETIC SPIN COATING TECHNIQUE**  
GÖZÜKIZIL M. F., TEMEL S., ÖZBAY N.  
SIGMA JOURNAL OF ENGINEERING AND NATURAL SCIENCES, vol.38, no.2, pp.955-960, 2020 (ESCI)
- VIII. **THERMAL BEHAVIOR OF INORGANIC HYDROGEL COMPOSITES**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
European Chemical Bulletin, vol.8, no.12, pp.399-404, 2019 (Scopus)
- IX. **Enhanced Antibacterial Property by the Synergetic Effect of TiO<sub>2</sub> and ZnO Nano-Particles in Biodegradable Hydrogel**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
EUROPEAN SCIENTIFIC JOURNAL, vol.15, no.33, pp.13-21, 2019 (Peer-Reviewed Journal)
- X. **An energy efficient way to produce zinc-based semiconductor thin films via chemical bath deposition technique**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
Journal of Sustainable Development of Energy, Water and Environment Systems, vol.7, no.2, pp.253-260, 2019 (Scopus)
- XI. **Bath Temperature Effect on c-axis Preferred Orientations and Band Gap of Semiconductor ZnO Thin Films**  
TEMEL S.  
Bilecik Şeyh Edebali Üniversitesi Fen Bilimleri Dergisi, vol.6, no.1, pp.24-28, 2019 (Peer-Reviewed Journal)
- XII. **Effects of Deposition Time on Structural and Morphological Properties of Synthesized ZnO Nanoflowers Without Using Complexing Agent**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
EUROPEAN SCIENTIFIC JOURNAL, vol.13, no.27, 2017 (Peer-Reviewed Journal)
- XIII. **Sol-Gel Döndürerek Kaplama Tekniği ile Saydam İletken ZnO İnce Filmlerin Üretilmesi ve Karakterizasyonu**  
TEMEL S., NEBİ M., PEKER D.

Gazi Üniversitesi Fen Bilimleri Dergisi Part C: Tasarım ve Teknoloji, vol.5, no.3, pp.51-59, 2017 (Peer-Reviewed Journal)

- XIV. **Short Time Synthesis Of ZnO Nanorods Prepared By A Hybrid Deposition Technique: Effects Of Seed Layer**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
International Journal of Current Advanced Research, vol.6, no.7, pp.4646-4649, 2017 (Peer-Reviewed Journal)
- XV. **Mg doped ZnO films by sol gel spin coating method**  
PEKER D., TEMEL S., Nebi M., SÜNTAR İ., GÜRBÜZ P.  
International Journal of Scientific and Technological Research, vol.1, no.1, pp.263-269, 2015 (Peer-Reviewed Journal)
- XVI. **ZnO Thin Films with Reactive Sputter at Different O<sub>2</sub> Concentrations and Some Physical Properties**  
KORKMAZ Ş., EKEM N., PAT S., BALBAĞ M. Z., ÖZKAN M., TEMEL S., ÇETİN N. E., ÖZMUMCU M., ELMAS S.  
Azerbaijan Journal of Physics, vol.16, no.2, pp.247-249, 2010 (Peer-Reviewed Journal)
- XVII. **ZrO<sub>2</sub> and SiO<sub>2</sub> Coatings of Mineral Lenses for Anti Reflection with Thermionic Vacuum Arc TVA Technique and Investigation of Some Physical Properties**  
EKEM N., KORKMAZ Ş., PAT S., BALBAĞ M. Z., ÖZKAN M., TEMEL S., ÇETİN N. E., ÖZMUMCU M., ELMAS S.  
Azerbaijan Journal of Physics, vol.16, no.2, pp.272-274, 2010 (Peer-Reviewed Journal)

## Books & Book Chapters

- I. **Metal Oksit Yarıiletken Gaz Sensörlerinin Üretim Parametreleri ve Sensör Kalitesini Belirleyen Faktörler**  
Nayman E., Gözükızıl M. F., Temel S.  
in: Mühendislik Alanındaki Gelişmeler, Prof. Dr. Gülden Başıyigit Kılıç, Editor, Platanus Publishing, Ankara, pp.375-401, 2023
- II. **CTO ve FTO Yarıiletken İnce Filmlerin Üretimi ve Bazı Fiziksel Özelliklerinin İncelenmesi**  
Özdemir O., Temel S., Gökmen F. Ö.  
in: Doğa Bilimleri ve Matematikte Öncü ve Çağdaş Çalışmalar, Prof. Dr. Canan ÖZDEMİR, Doç. Dr. Ali ÖZDEMİR, Editor, Duvar Kitabevi, İzmir, pp.17-34, 2023
- III. **Metal Oksit Yarıiletken Gaz Sensörlerinin Üretim Parametreleri ve Sensör Kalitesini Belirleyen Faktörler**  
NAYMAN E., GÖZÜKIZIL M. F., TEMEL S.  
in: Mühendislik Alanında Gelişmeler, Prof. Dr. Gülden Başıyigit Kılıç, Editor, Platanus Kitap, Ankara, pp.376-402, 2023
- IV. **ZNO/HAP/PVA KOMPOZİT MALZEMELERİN ÜRETİLMESİ, YAPISAL VE MORFOLOJİK ÖZELLİKLERİNİN İNCELENMESİ**  
TEMEL S., GÖKMEN F. Ö., YAMAN E., GÖZÜKIZIL M. F.  
in: Fen ve Matematik Bilimlerinde Güncel Araştırmalar, Prof. Dr. Cansu FİLİK İŞÇEN, Editor, Livre de Lyon, pp.11-26, 2022
- V. **PHEMA FİMLERİNİN YERİNDE (IN-SITU) RADİKALİK POLİMERİZASYON TEKNİĞİ İLE ÜRETİLMESİ**  
TEMEL S., GÖKMEN F. Ö., YAMAN E., GÖZÜKIZIL M. F.  
in: Fen ve Matematik Bilimlerinde Güncel Araştırmalar, Prof. Dr. Cansu FİLİK İŞÇEN, Editor, Livre de Lyon, pp.1-9, 2022
- VI. **Deposition of Cd-Doped ZnO Thin Films as Transparent Electrode for Solar Cell Applications**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
in: Recent Advances in Environmental Science from the Euro-Mediterranean and Surrounding Regions, Mohamed Ksibi, Achraf Ghorbal, Sudip Chakraborty, Helder I. Chaminé, Maurizio Barbieri, Giulia Guerriero, Olfa Hentati, Abdelazim Negm, Anthony Lehmann, Jörg Römbke, Armando Costa Duarte, Elena Xoplaki, Nabil Khélifi, Gilles Colinet, João Miguel Dias, Imed Gargouri, Eric D. Van Hullebusch, Benigno Sánchez Cabrero, Settimio Ferlisi, Chedly Tizaoui, Amjad Kallel, Sami Rtimi, Sandeep Panda, Philippe Michaud, Jaya Narayana Sahu, Mongi Seffen, Vincenzo

Nadde, Editor, Springer, pp.1753-1757, 2021

**VII. Effects of Boric Acid on Cotton and Polyester Yarn**

GÖZÜKIZIL M. F., TEMEL S., YAMAN E., GÖKMEN F. Ö.

in: Academic Studies in Science and Mathematics, Duygu BALPETEK KULCU, Editor, Duvar Kitapevi, pp.47-58, 2021

**VIII. Efficient Conversion of Rapeseed Cake into Bio-Alcohol Through Pyrolysis**

YAMAN E., ÖZBAY N., TEMEL S., GÖKMEN F. Ö.

in: Recent Advances in Environmental Science from the Euro-Mediterranean and Surrounding Regions, Mohamed Ksibi, Achraf Ghorbal, Sudip Chakraborty, Helder I. Chaminé, Maurizio Barbieri, Giulia Guerriero, Olfa Hentati, Abdelazim Negm, Anthony Lehmann, Jörg Römbke, Armando Costa Duarte, Elena Xoplaki, Nabil Khélifi, Gilles Colinet, João Miguel Dias, Imed Gargouri, Eric D. Van Hullebusch, Benigno Sánchez Cabrero, Settimio Ferlisi, Chedly Tizaoui, Amjad Kallel, Sami Rtimi, Sandeep Panda, Philippe Michaud, Jaya Narayana Sahu, Mongi Seffen, Vincenzo Nadde, Editor, Springer, pp.1501-1505, 2021

**IX. An Application of PVA-Zeolite Composite Films as Packaging Material**

TEMEL S., YAMAN E., GÖZÜKIZIL M. F., GÖKMEN F. Ö.

in: Academic Studies in Science and Mathematics, Duygu BALPETEK KULCU, Editor, Duvar Kitapevi, pp.95-101, 2021

**X. ANTİBAKTERİYEL VE BİYOBOZUNUR NANO SiO<sub>2</sub> KATKILI POLİ (HİDROKSİETİLMETAKRİLAT) (PHEMA) NANOKOMPOZİT HİDROJELLER**

GÖKMEN F. Ö., TEMEL S., YAMAN E.

in: Fen Bilimleri ve Matematikte Teori ve Araştırmalar II, PROF. DR. HASAN AKGÜL, DOÇ. DR. MEHMET YÜKSEL, Editor, GECE KİTAPLIĞI YAYINEVİ, pp.117-132, 2020

**XI. Yarıiletken Metal Oksit İnce Filmlerin Sol-Gel Manyetik Döndürerek Kaplama Tekniği ile Üretimi ve Bazı Fiziksel Özelliklerinin İncelenmesi**

TEMEL S., GÖKMEN F. Ö., YAMAN E.

in: Academic Research in Science and Engineering, Doç.Dr. Mehmet Dalkılıç, Editor, Gece Akademi, pp.105-114, 2019

**XII. SiO<sub>2</sub> ve TiO<sub>2</sub> Katkılı Akrilik Asit Nanokompozit Hidrojellerinin Sentezi ve Karakterizasyonu**

GÖKMEN F. Ö., TEMEL S., YAMAN E.

in: Fen Bilimleri ve Matematik, Doç. Dr. Ali Yakar - Doç. Dr. Hüseyin Topaklı, Editor, Nobel Yayınevi, pp.291-308, 2018

**XIII. Farklı Takviye Malzemelerinin Akrilik Asit-Vinil Pirrolidon Kopolimerik Hidrojellerin Kimyasal, Yapısal ve Isıl Özelliklerine Etkisi**

GÖKMEN F. Ö., TEMEL S., YAMAN E.

in: Fen Bilimleri ve Matematik, Doç. Dr. Ali Yakar - Doç. Dr. Hüseyin Topaklı, Editor, Nobel Yayınevi, pp.193-206, 2018

## Refereed Congress / Symposium Publications in Proceedings

**I. Katkılamanın TiO<sub>2</sub> İnce Filmler Üzerine Etkilerinin Araştırılması**

Özdemir O., Temel S., Gökmen F. Ö.

5. INTERNATIONAL PALANDOKEN SCIENTIFIC STUDIES CONGRESS, Erzurum, Turkey, 18 - 19 March 2023, pp.165-166

**II. Sensör Uygulamaları için Pamuk İplik Yüzeylerine PVA ve PVA/GO Yarıiletken İnce Film Biriktirme**

NAYMAN E., GÖZÜKIZIL M. F., TEMEL S., GÖKMEN F. Ö., YAMAN E.

3. Uluslararası Dicle Bilimsel Araştırmalar ve İnovasyon Kongresi, Turkey, 26 - 27 November 2022

**III. Production of ZnO Nanorod Structures for Use in Photovoltaic Cells**

Arslan E., TEMEL S.

2th International AEGEAN SCIENTIFIC RESEARCH SYMPOSIUM, Turkey, 12 March 2022

**IV. Investigation of nano SiO<sub>2</sub> effect on Starch-PVA nanocomposite films**

TEMEL S., GÖKMEN F. Ö., YAMAN E., GÖZÜKIZIL M. F.

TURKISH PHYSICAL SOCIETY 37 th INTERNATIONAL PHYSICS CONGRESS, Muğla, Turkey, 1 - 05 September 2021

- V. **An application of PVA-zeolite composite films as packaging material**  
TEMEL S., YAMAN E., GÖKMEN F. Ö., GÖZÜKIZIL M. F.  
TURKISH PHYSICAL SOCIETY 37 th INTERNATIONAL PHYSICS CONGRESS, Muğla, Turkey, 1 - 05 September 2021
- VI. **Biyokütleinin Karbonizasyonu ile Elde Edilen Katı Ürünün Katalizör Destek Malzemesi Olarak Değerlendirilmesi**  
YAMAN E., GÖKMEN F. Ö., TEMEL S., ÖZBAY N.  
3. Ulusal Karbon Konferansı, İstanbul, Turkey, 11 - 12 March 2021
- VII. **Deposition of Cd-Doped ZnO Thin Films as Transparent Electrode for Solar Cell Applications**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
2nd Euro-Mediterranean Conference on Environmental Integration, EMCEI 2019, Sousse, Tunisia, 10 - 13 October 2019, pp.1753-1757
- VIII. **Efficient Conversion of Rapeseed Cake into Bio-Alcohol Through Pyrolysis**  
YAMAN E., ÖZBAY N., TEMEL S., GÖKMEN F. Ö.  
2nd Euro-Mediterranean Conference on Environmental Integration, EMCEI 2019, Sousse, Tunisia, 10 - 13 October 2019, pp.1501-1505
- IX. **Deposition of ZnO Thin Films by Using a Novel Technique: Magnetic Spin Coating**  
GÖZÜKIZIL M. F., TEMEL S., ÖZBAY N.  
ADIM Physics Days VIII, Turkey, 12 - 15 September 2019, pp.119-126
- X. **NiZnO nanocomposite thin films deposited by a novel technique: Magnetic spin coating**  
TEMEL S., YAMAN E., GÖKMEN F. Ö.  
Turkish Physical Society 35th International Physics Congress, TPS 2019, Konacik-Bodrum, Turkey, 4 - 08 September 2019, vol.2178
- XI. **Microstructural and optical properties of Cu doped ZnO thin films prepared by magnetic spin coating**  
TEMEL S., YAMAN E., GÖKMEN F. Ö.  
Turkish Physical Society 35th International Physics Congress, TPS 2019, Konacik-Bodrum, Turkey, 4 - 08 September 2019, vol.2178
- XII. **Growth of ZnO Nano-flower on Nano-TiO<sub>2</sub> Doped Biodegradable Hydrogel: An Investigation of Antibacterial Property**  
GÖKMEN F. Ö., YAMAN E., TEMEL S., ÖZBAY N.  
1st International Congress on Analytical and Bioanalytical Chemistry (1st ICABC 2019), Turkey, 27 - 30 March 2019
- XIII. **Environmental approach of utilizing co-polymeric hydrogel: An application of dye removal**  
GÖKMEN F. Ö., YAMAN E., TEMEL S., ÖZBAY N.  
1st International Congress on Analytical and Bioanalytical Chemistry (1st ICABC 2019), Turkey, 27 - 30 March 2019
- XIV. **Synthesis and characterization of TiO<sub>2</sub> co-polymeric hydrogel**  
TEMEL S., YAMAN E., GÖKMEN F. Ö.  
34th International Physics Congress on Turkish Physical Society, TPS 2018, Konacik-Bodrum, Turkey, 5 - 09 September 2018, vol.2042
- XV. **Optimization of Poly (Acrylic Acid-co-N-vinyl 2-pyrrolidone)/SiO<sub>2</sub> Nanocomposite Hydrogels**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
8th Black Sea Basin Conference on Analytical Chemistry (8th BBCAC), Turkey, 9 - 11 May 2018
- XVI. **Synthesis, Characterization and Swelling Behavior of Poly (Acrylic Acid-co-N-vinyl 2-pyrrolidone) Copolymeric Hydrogels**  
GÖKMEN F. Ö., YAMAN E., TEMEL S.  
8th Black Sea Basin Conference on Analytical Chemistry (8th BBCAC), Turkey, 9 - 11 May 2018
- XVII. **SiO<sub>2</sub> based nanocomposite hydrogels: A reusable super adsorbent for remove basic textile dyes**  
GÖKMEN F. Ö., TEMEL S., YAMAN E., ÖZBAY N.  
14th Nanoscience and Nanotechnology Conference (NanoTR-14), İzmir, Turkey, 22 - 25 September 2018
- XVIII. **Remove methylene blue dye from waste water by using Poly (acrylic acid)/SiO<sub>2</sub> and Poly (acrylic**

**acid-co-vinyl pyrrolidone)/SiO<sub>2</sub> nanocomposite hydrogels**

GÖKMEN F. Ö., TEMEL S., YAMAN E.

14th Nanoscience and Nanotechnology Conference (NanoTR-14), İzmir, Turkey, 22 - 25 September 2018

- XIX. **Fabrication of ZnO nanoflowers on poly acrylic acid hydrogels by chemical bath deposition technique**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
34th Turkish Physical Society International Physical Congress, Muğla, Turkey, 5 - 09 September 2018
- XX. **Synthesis and characterization of TiO<sub>2</sub> copolymeric hydrogel: to investigate photocatalytic and antimicrobial behaviour**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
34th Turkish Physical Society International Physical Congress, Muğla, Turkey, 5 - 09 September 2018
- XXI. **Preparation of SiO<sub>2</sub> Doped Biodegradable Polyacrylic Acid Nanocomposite Hydrogels for Upgrading of Life Under Water**  
GÖKMEN F. Ö., YAMAN E., TEMEL S.  
12th International Symposium on Pharmaceutical Sciences, Turkey, 26 - 29 June 2018
- XXII. **Optimization of Poly (Acrylic Acid-Co-N-Vinyl 2-Pyrrolidone) / SiO<sub>2</sub> Nanocomposite Hydrogels for Drug Delivery Systems**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
12th International Symposium on Pharmaceutical Sciences, Turkey, 26 - 29 June 2018
- XXIII. **Preparation, Characterization and Swelling Behavior of PAA/PVP Copolymeric Hydrogel as a Drug Carrier Agent**  
GÖKMEN F. Ö., TEMEL S., YAMAN E., ÖZBAY N.  
12th International Symposium on Pharmaceutical Sciences, Turkey, 26 - 29 June 2018
- XXIV. **Biocompatible TiO<sub>2</sub> Doped Hydrogel Production for Drug Delivery Systems**  
GÖKMEN F. Ö., YAMAN E., TEMEL S., ÖZBAY N.  
12th International Symposium on Pharmaceutical Sciences, Turkey, 26 - 29 June 2018
- XXV. **Nanocomposite Hydrogel Production and Characterization for Dye Removal Applications in Wastewater Treatment**  
GÖKMEN F. Ö., YAMAN E., TEMEL S.  
4th Anatolian Energy Symposium with International Participation AES 2018, Turkey, 18 - 20 April 2018
- XXVI. **Optimization of ZnS Semiconductor Thin Films for Solar Cell Applications**  
TEMEL S., YAMAN E., GÖKMEN F. Ö.  
4th Anatolian Energy Symposium with International Participation AES 2018, Turkey, 18 - 20 April 2018
- XXVII. **Deposition of the II-IV Group Semiconductor Thin Films for Solar Cell Applications**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
4th Anatolian Energy Symposium with International Participation AES 2018, Turkey, 18 - 20 April 2018
- XXVIII. **Deposition and characterization of ZnSe nanocrystalline thin films**  
TEMEL S., GÖKMEN F. Ö., YAMAN E., NEBİ M.  
Turkish Physical Society 33rd International Physics Congress, TPS 2017, Konacik-Bodrum, Turkey, 6 - 10 September 2017, vol.1935
- XXIX. **Deposition of Co doped TiO<sub>2</sub> films using sol gel spin coating technique and investigation of band gap**  
NEBİ M., PEKER D., TEMEL S.  
Turkish Physical Society 33rd International Physics Congress, TPS 2017, Konacik-Bodrum, Turkey, 6 - 10 September 2017, vol.1935
- XXX. **Deposition and Characterization of ZnS Thin Films Prepared by Chemical Bath Deposition**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
2nd International Conference on Applied Chemistry (ICAC-2), Egypt, 25 - 28 November 2017
- XXXI. **Synthesis and Characterization of Nanocomposite Hydrogels**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
2nd International Conference on Applied Chemistry (ICAC-2), Egypt, 25 - 28 November 2017
- XXXII. **Environmentalist Production of ZnSe Thin Films via Chemical Bath Deposition**



- TEMEL S., GÖKMEN F. Ö., YAMAN E.  
International Congress of Health and Environment, Turkey, 23 - 25 October 2017
- XXXIII. **Synthesis and Characterization of AA-nano TiO<sub>2</sub> Nanocomposite Hydrogels**  
GÖKMEN F. Ö., TEMEL S., YAMAN E.  
13th Nanoscience and Nanotechnology Conference, Turkey, 22 - 25 October 2017
- XXXIV. **Synthesis of ZnO Nanorods via Sol-gel Assisted Chemical Bath Deposition Method**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
13th Nanoscience and Nanotechnology Conference, Turkey, 22 - 25 October 2017
- XXXV. **Production and Characterization of ZnX (X: O, S and Se) Semiconductor Thin Films by Chemical Bath Deposition Technique**  
TEMEL S., GÖKMEN F. Ö., YAMAN E.  
12th Conference on Sustainable Development of Energy, Water and Environment Systems, Croatia, 4 - 08 October 2017
- XXXVI. **Influence of deposition temperature on structural, morphological and optical properties of ZnS thin films**  
TEMEL S.  
33th International Physics Congress, Turkish Physical Society, Muğla, Turkey, 6 - 10 September 2017
- XXXVII. **Deposition of doped TiO<sub>2</sub> films using sol gel spin coating technique and investigation of band gap**  
Nebi M., PEKER D., TEMEL S.  
33th International Physics Congress, Turkish Physical Society, Muğla, Turkey, 6 - 10 September 2017
- XXXVIII. **Deposition and Characterization of ZnSe Nanocrystalline Thin Films**  
TEMEL S., GÖKMEN F. Ö., YAMAN E., NEBİ M.  
33th International Physics Congress, Turkish Physical Society, Turkey, 6 - 10 September 2017
- XXXIX. **Band Gap Engineering of ZnO Thin Films via Mg Doping**  
TEMEL S., Nebi M., PEKER D.  
32th International Physics Congress, Turkish Physical Society, Bodrum/Muğla, Turkey, 6 - 09 September 2016
- XL. **Structural Morphological and Optical Characterization of Sol Gel Prepared MgO Thin Films**  
TEMEL S., Nebi M., PEKER D.  
32th International Physics Congress, Turkish Physical Society, Bodrum/Muğla, Turkey, 6 - 09 September 2016
- XLI. **ZnO Saydam İletken Oksit İnce Filmlerin Üretimi ve Bazı Fiziksel Özelliklerinin İncelenmesi**  
TEMEL S., Murat N., PEKER D.  
IV. Ulusal Güneş ve Hidrojen Enerjisi Kongresi (UGHEK 2014), Turkey, 22 - 23 May 2014
- XLII. **Sol Gel Döndürerek Kaplama Yöntemi ile MgO İnce Filmlerin Üretimi ve Bazı Fiziksel Özelliklerinin İncelenmesi**  
Murat N., TEMEL S., PEKER D.  
IV. Ulusal Güneş ve Hidrojen Enerjisi Kongresi (UGHEK 2014), Turkey, 22 May 2014
- XLIII. **Deposition and Characterization of Carbon Thin Films**  
TEMEL S., Nebi M., PEKER D.  
30th International Physics Congress, Turkish Physical Society, Turkey, 2 - 05 September 2013
- XLIV. **DEDOSITED MgF<sub>2</sub> THIN FILMS BY THERMIONIC VACUUM ARC TVA**  
AYDOĞMUŞ T., EKEM N., PAT S., BALBAĞ M. Z., KORKMAZ Ş., TEMEL S., ÇETİN N. E., ÖZMUMCU M., ELMAS S., Nebi M., et al.  
28th International Physics Congress, Turkish Physical Society, Turkey, 6 - 09 September 2011
- XLV. **DEPOSITED AR COATINGS OF PET SUBSTRATES BY THERMIONIC VACUUM ARC TVA TECHNIQUE**  
PEKDEMİR S., EKEM N., PAT S., BALBAĞ M. Z., KORKMAZ Ş., TEMEL S., ÇETİN N. E., ÖZMUMCU M., ELMAS S., Nebi M., et al.  
28th International Physics Congress, Turkish Physical Society, Turkey, 6 - 09 September 2011
- XLVI. **SOME PHYSICAL PROPERTIES OF DEPOSITED ITO THIN FILMS BY THERMIONIC VACUUM ARC TVA TECHNIQUE**  
ELMAS S., EKEM N., PAT S., BALBAĞ M. Z., KORKMAZ Ş., TEMEL S., Nebi M., ÇETİN N. E., ÖZMUMCU M., AYDOĞMUŞ T., et al.

28th International Physics Congress, Turkish Physical Society, Turkey, 6 - 09 September 2011

**XLVII. INVESTIGATION OF SOME PHYSICAL PROPERTIES OF DEPOSITED GaAs THIN FILMS BY RF SPUTTERING**

Nebi M., EKEM N., PAT S., BALBAĞ M. Z., KORKMAZ Ş., TEMEL S., ÇETİN N. E., ÖZMUMCU M., ELMAS S., AYDOĞMUŞ T., et al.

28th International Physics Congress, Turkish Physical Society, Turkey, 6 - 09 September 2011

**XLVIII. Deposition of ITO Thin Films by Thermoionic Vacuum Arc TVA Technique**

ELMAS S., EKEM N., PAT S., BALBAĞ M. Z., ÖZKAN M., KORKMAZ Ş., TEMEL S., Nebi M., ÇETİN N. E., ÖZMUMCU M.

7th Nanoscience and Nanotechnology Conference (NanoTR-7), Turkey, 27 June - 01 July 2011

**XLIX. Anti Reflective Coatings of Mineral Lenses with Thermionic Vacuum Arc TVA Technique and Investigation of Some Physical Properties**

TEMEL S., EKEM N., PAT S., BALBAĞ M. Z., ÖZKAN M., KORKMAZ Ş.

6th Nanoscience and Nanotechnology Conference (NanoTR-6), Turkey, 15 - 18 June 2010

**L. Termiyonik Vakum Ark TVA Yöntemiyle ZrO<sub>2</sub> Gözlük Camı Kaplamalarının Yapılması**

TEMEL S., EKEM N., PAT S., BALBAĞ M. Z., ÖZKAN M., MUSA G.

26th International Physical Congress, Turkish Physical Society, Turkey, 23 - 27 September 2009

**LI. RF Saçtırma Yöntemi Kullanılarak Elde Edilen ZnO İnce Filmlerinin Bazı Optik Özelliklerinin Oksijen Konsantrasyonuna Göre İncelenmesi**

EKEM N., PAT S., BALBAĞ M. Z., KORKMAZ Ş., TEMEL S., ÇETİN N. E., ELMAS S., MUSA G.

MYOMAT 2009, Turkey, 15 - 16 June 2009

**LII. B<sub>2</sub>O<sub>3</sub> Na<sub>2</sub>O MgO V<sub>2</sub>O<sub>5</sub> Camların ve Camı İnce Filmlerinin Bazı Fiziksel Özelliklerinin İncelenmesi**

KILIÇ G., TEMEL S., ARAL E.

MYOMAT 2009, Turkey, 15 - 16 June 2009

**LIII. GaAs İnce Film Üretimi ve Elde Edilen GaAs İnce Filminin Bazı Optik Özellikleri**

EKEM N., PAT S., BALBAĞ M. Z., ÖZKAN M., TEMEL S., ÖZMUMCU M., GEDİK E., MUSA G.

MYOMAT 2009, Turkey, 15 - 16 June 2009

**LIV. RF Saçtırma Tekniği ile Üretilen GaAsN İnce Filmlerin Bazı Optik Özelliklerinin İncelenmesi**

EKEM N., PAT S., BALBAĞ M. Z., ÖZKAN M., KORKMAZ Ş., TEMEL S., ELMAS S., MUSA G.

MYOMAT 2009, Turkey, 15 - 16 June 2009

**LV. Investigation of the carbon produced by methane pulsed discharge**

CENİK K., TEMEL S., Nebi M., EKEM N., AKAN T., PAT S., BALBAĞ M. Z., CENİK M. İ., VLADOIU R., TANIŞLI M., et al.

5th International Student Conference of Balkan Physical Union, Turkey, 21 - 24 August 2007

## Supported Projects

TEMEL S., GÖZÜKIZIL M. F., YAMAN E., GÖKMEN F. Ö., NAYMAN E., Project Supported by Higher Education Institutions, Katkılı/Katkısız Metal Oksit (MO) Nanopartikül (NP) Üretimi Ve Bazı Fiziksel Özelliklerinin İncelenmesi, 2023 - Continues

YAMAN E., TEMEL S., Project Supported by Higher Education Institutions, ZnO/HAP/PVA Kompozit Malzemelerin Üretilmesi, Yapısal Ve Morfolojik Özelliklerinin İncelenmesi, 2021 - Continues

Yaman E., Özbay N., Gökmen F. Ö., Temel S., TUBITAK Project, İnatçı ve Zararlı Organik Su Kirleticilerinin Ucuz, Yenilenebilir ve Çevreci Bir Fotokatalizör Olan TiO<sub>2</sub>@Biyokömür Yardımı ile Sonofotokatalitik Olarak Bozundurulması, 2022 - 2023

TEMEL S., GÖKMEN F. Ö., YAMAN E., Project Supported by Higher Education Institutions, Antibakteriyel ve biyobozunur nano SiO<sub>2</sub> katkılı poli (hidroksietilmetakrilat) (PHEMA) nanokompozit hidrojel, 2019 - 2021

ÖZBAY N., TEMEL S., ÖZSİN G., GÖKMEN F. Ö., YAMAN E., Project Supported by Higher Education Institutions, Biyo-alkol üretiminde katalizör destek malzemesi olarak kullanılmak üzere biyo-tabanlı malzeme üretimi ve uygulamaları, 2019 - 2020

GÖZÜKIZIL M. F., ÖZBAY N., TEMEL S., YAMAN E., GÖKMEN F. Ö., Project Supported by Higher Education Institutions, Katkılı Metal Oksit İnce Filmlerin Sol-Gel Manyetik Döndürerek Kaplama Tekniği ile Üretimi ve Bazı Fiziksel Özelliklerinin İncelenmesi, 2018 - 2019

GÖKMEN F. Ö., ÖZBAY N., TEMEL S., YAMAN E., Project Supported by Higher Education Institutions, Nanokompozit Hidrojellerin Sentezi ve Karakterizasyonu, 2017 - 2018

TEMEL S., Project Supported by Higher Education Institutions, Kimyasal Banyo Depolama Tekniđi İle II-VI Grubu Yarı İletken İnce Filmlerin Üretilmesi ve Karakterizasyonu, 2016 - 2017

YAMAN E., TEMEL S., GÖKMEN F. Ö., Project Supported by Higher Education Institutions, Kimyasal Banyo Depolama Tekniđi ile II VI Grubu Yarıiletken İnce Filmlerin Üretilmesi ve Karakterizasyonu, 2016 - 2017

TUBITAK Project, Özel Bir Termiyonik Vakum Ark TVA Tekniđi Kullanılarak Gözlük Camlarına Bazı Kaplamaların Yapılması ve Fiziksel Özelliklerinin İncelenmesi, 2009 - 2011

TEMEL S., TUBITAK Project, Çok Boyutlu Kuantum Grup Simetrik Genelleştirilmiş Bozon ve Fermiyon Kuantum Gazlarının Termo İstatistiksel Özelliklerinin İncelenmesi, 2007 - 2009

## **Awards**

Temel S., "Determination of Breakdown Voltage at Plasma" Başlıklı Proje ile Uluslararası Fizik Projeleri Yarışmasında Üçüncülük Ödülü , Balkan Physical Union , August 2007