

Assoc. Prof. MEHMET GÜRSUL

Personal Information

Office Phone: [+90 322 338 6084](tel:+903223386084) Extension: 2480

Email: mgursul@cu.edu.tr

Web: <https://avesis.cu.edu.tr/mgursul>

International Researcher IDs

ORCID: 0000-0002-3025-2183

Publons / Web Of Science ResearcherID: G-5239-2018

Yoksis Researcher ID: 184334

Education Information

Doctorate, Cukurova University, Fen Bilimleri Enstitüsü, Fizik, Turkey 2013 - 2019

Undergraduate, Cukurova University, Mühendislik Fakültesi, Elektrik-Elektronik Mühendisliği, Turkey 2015 - 2018

Postgraduate, Cukurova University, Fen Bilimleri Enstitüsü, Fizik, Turkey 2011 - 2013

Postgraduate, Inonu University, Fen Bilimleri Enstitüsü, Fizik, Turkey 2010 - 2011

Undergraduate, Middle East Technical University, Fen Edebiyat Fakültesi, Fizik, Turkey 2003 - 2010

Undergraduate, Anadolu University, Open Education Faculty, Kamu Yönetimi, Turkey 2005 - 2009

Foreign Languages

English, B2 Upper Intermediate

Dissertations

Doctorate, FeSe Tabanlı Kristallerin Üretimi, Karakterizasyonu ve Fiziksel Özelliklerinin Araştırılması, Cukurova University, Fen Bilimleri Enstitüsü, Fizik Anabilim Dalı, 2019

Postgraduate, Na KATKILI BSCCO SÜPERİLETKENİNİN AKTİVASYON ENERJİSİNE SİNERJİLEME SICAKLIĞININ ETKİSİ, Cukurova University, Fen Bilimleri Enstitüsü, Fizik, 2013

Research Areas

Physics, Condensed Matter 1: Structural, Mechanical and Thermal Properties, Thermal Properties of Condensed Matter, Intensive Article 2: Electronic Structure, Electric, Magnetic and Optical Properties, Magnetic Properties and Materials, Superconductivity, Natural Sciences

Academic Titles / Tasks

Research Assistant, Cukurova University, Fen Bilimleri Enstitüsü, Fizik, 2011 - 2018

Research Assistant, --Seçiniz--, Leibniz Institute For Solid State And Materials Research, Dresden, Institute For Solid State Research, 2014 - 2015

Published journal articles indexed by SCI, SSCI, and AHCI

- I. **Remarkable variation in microstructural, thermoelectric, and magnetic properties of CaMnO_3 through Ce doping**
GÜRSUL M., ÇETİN G., ERGİN İ., Korkmaz L., ÖZÇELİK B., Torres M., Madre M., Sotelo A.
Materials Science and Engineering: B, vol.299, 2024 (SCI-Expanded)
- II. **Drastic microstructural modification of $\text{Bi}_2\text{Ca}_2\text{Co}_2\text{O}_y$ ceramics by Na doping and laser texturing**
Özçelik C., Depci T., Gürsul M., Çetin G., Özçelik B., Torres M. A., Madre M. A., Sotelo A.
Boletín de la sociedad española de cerámica y vidrio, vol.61, no.6, pp.634-640, 2022 (SCI-Expanded)
- III. **Detailed low temperature studies on thermoelectric performance of K-doped $\text{Bi}_2\text{Ca}_2\text{Co}_2\text{O}_y$ ceramics fibers**
Ozcelik C., Depci T., Cetin G., Gursul M., Ozcelik B., Madre M. A., Sotelo A., Ando H., Terashima K., Takano Y.
PHYSICA SCRIPTA, vol.97, no.8, 2022 (SCI-Expanded)
- IV. **Impact of silver addition on the superconducting performances of $\text{Bi}_2\text{Sr}_2\text{Ca}_{0.925}\text{Na}_{0.075}\text{Cu}_2\text{O}_y\text{:Ag}$ composite fibers**
Atilla B., Ergin İ., Gürsul M., Özçelik B.
JOURNAL OF THE EUROPEAN CERAMIC SOCIETY, vol.1, no.1, pp.1-10, 2022 (SCI-Expanded)
- V. **Role of Y substitution for Ca-site on magneto-resistivity properties of Bi-2212 superconductor rods prepared by LFZ**
GÜRSUL M., Ozcelik C., ERGİN İ., Madre M. A., Sotelo A., ÖZÇELİK B.
MATERIALS CHEMISTRY AND PHYSICS, vol.282, 2022 (SCI-Expanded)
- VI. **Tuning thermoelectric properties of $\text{Bi}_2\text{Ca}_2\text{Co}_2\text{O}_y$ through K doping and laser floating zone processing**
Ozcelik C., Depci T., GÜRSUL M., ÇETİN G., ÖZÇELİK B., Torres M. A., Madre M. A., Sotelo A.
SOLID STATE SCIENCES, vol.120, 2021 (SCI-Expanded)
- VII. **Significant enhancement of superconducting performances of Bi-2212 fibers through combined sodium substitution and LFZ process**
GÜRSUL M., Ergin İ., Ozcelik C., Depci T., ÖZÇELİK B., Madre M. A., Sotelo A.
JOURNAL OF MATERIALS SCIENCE-MATERIALS IN ELECTRONICS, vol.32, no.13, pp.17686-17699, 2021 (SCI-Expanded)
- VIII. **Increase of electric performances in $\text{Bi}_2\text{Sr}_{2-x}\text{Rb}_x\text{Co}_2\text{O}_8$ +delta laser grown ceramics induced by annealing**
ÖZÇELİK B., ÇETİN G., GÜRSUL M., Ozcelik C., Torres M. A., Madre M. A., Sotelo A.
SOLID STATE SCIENCES, vol.108, 2020 (SCI-Expanded)
- IX. **Effect of annealing and potassium substitution on the thermoelectric and magnetic properties of directionally grown $\text{Bi}_2\text{Sr}_2\text{Co}_2\text{O}_y$ ceramics**
ÇETİN G., ÖZÇELİK B., GÜRSUL M., Torres M. A., Madre M. A., Sotelo A.
Boletín de la Sociedad Española de Cerámica y Vidrio, vol.59, no.3, pp.121-128, 2020 (SCI-Expanded)
- X. **Low temperature thermoelectric properties of K-substituted $\text{Bi}_2\text{Sr}_2\text{Co}_2\text{O}_y$ ceramics prepared via laser floating zone technique**
ÖZÇELİK B., ÇETİN G., GÜRSUL M., MADRE M. A., SOTELO A., ADACHI S., TAKANO Y.
JOURNAL OF THE EUROPEAN CERAMIC SOCIETY, vol.39, no.10, pp.3082-3087, 2019 (SCI-Expanded)
- XI. **Structural and physical properties of Na-substituted $\text{K}_{0.8}\text{Fe}_2\text{-ySe}_2$ single crystal**
GÜRSUL M., ÖZÇELİK B., LIU M., BOLTALIN A. I., MOROZOV I. V.
JOURNAL OF ALLOYS AND COMPOUNDS, vol.777, pp.1074-1079, 2019 (SCI-Expanded)
- XII. **Effect of Na-substitution on magnetoresistance and flux pinning energy of Bi-2212 ceramics prepared via hot-forging process**
ÖZÇELİK B., GÜRSUL M., Nane F. K., Madre M. A., Sotelo A.
JOURNAL OF MATERIALS SCIENCE-MATERIALS IN ELECTRONICS, vol.29, no.22, pp.19147-19154, 2018 (SCI-Expanded)
- XIII. **Effect of Sodium Substitution on Structural and Magnetic Properties of $\text{KFe}_2\text{-y Se}_2$**
GÜRSUL M., ÖZÇELİK B., EKİCİBİL A., LIU M., Boltalin A. I., Morozov I. V.

- JOURNAL OF SUPERCONDUCTIVITY AND NOVEL MAGNETISM, vol.29, no.9, pp.2401-2406, 2016 (SCI-Expanded)
- XIV. **Effect of Cooling Rate on Structure, Composition, and Superconducting Properties of FeTe_{0.6}Se_{0.4} Prepared by Self-Flux Technique**
GÜRSUL M., EKİCİBİL A., GÜLER N. K., ÖZÇELİK B.
JOURNAL OF SUPERCONDUCTIVITY AND NOVEL MAGNETISM, vol.29, no.5, pp.1187-1192, 2016 (SCI-Expanded)
- XV. **Thermal Conductivity and Thermoelectric Power of Potassium and Sodium-Substituted Bi-2212 Superconductor Prepared by PEI Technique**
ÖZÇELİK B., TANGUNER A., GÜRSUL M., Sotelo A., Madre M. A.
JOURNAL OF SUPERCONDUCTIVITY AND NOVEL MAGNETISM, vol.28, no.9, pp.2641-2647, 2015 (SCI-Expanded)
- XVI. **Sintering Effects in Na-Substituted Bi-(2212) Superconductor Prepared by a Polymer Method**
GÜRSUL M., EKİCİBİL A., ÖZÇELİK B., Madre M. A., Sotelo A.
JOURNAL OF SUPERCONDUCTIVITY AND NOVEL MAGNETISM, vol.28, no.7, pp.1913-1924, 2015 (SCI-Expanded)
- XVII. **Improvement of the intergranular pinning energy in the Na-doped Bi-2212 superconductors**
ÖZÇELİK B., GÜRSUL M., Sotelo A., Madre M. A.
JOURNAL OF MATERIALS SCIENCE-MATERIALS IN ELECTRONICS, vol.26, no.5, pp.2830-2837, 2015 (SCI-Expanded)
- XVIII. **Improvement of superconducting properties in Na-doped BSCCO superconductor**
ÖZÇELİK B., GÜRSUL M., Sotelo A., Madre M. A.
JOURNAL OF MATERIALS SCIENCE-MATERIALS IN ELECTRONICS, vol.26, no.1, pp.441-447, 2015 (SCI-Expanded)
- XIX. **Effect of K substitution on Structural, Electrical and Magnetic Properties of Bi-2212 system**
ÖZÇELİK B., GÜRSUL M., Sotelo A., Madre M. A.
JOURNAL OF MATERIALS SCIENCE-MATERIALS IN ELECTRONICS, vol.25, no.10, pp.4476-4482, 2014 (SCI-Expanded)

Articles Published in Other Journals

- I. **Rapid Suppression of Superconductivity in Co₃₀₄ Nanoparticles-added Bi-2212 Ceramics**
GÜRSUL M.
Türk Doğa ve Fen Dergisi, vol.12, no.1, pp.44-52, 2023 (Peer-Reviewed Journal)
- II. **Detail investigation of thermoelectric performance and magnetic properties of Cs-doped Bi₂Sr₂Co₂O_y ceramic materials**
Ozcelik B., Gursul M., Cetin G., Ozcelik C., Torres M. A., Madre M. A., Sotelo A.
SN APPLIED SCIENCES, vol.3, no.1, 2021 (ESCI)
- III. **Effects of Rotor Material on Eddy Current Brake Performance**
ULUOCAK İ., YAVUZ H., GÜRSUL M.
European Mechanical Science, vol.1, no.4, pp.129-132, 2017 (Peer-Reviewed Journal)
- IV. **The synthesis and magnetic structure of the iron selenide Ba_{0.8}Fe₂Se₂**
KANTARCI GÜLER N., GÜRSUL M., IŞIK C., EKİCİBİL A., ÖZÇELİK B., OKAZAKI H., TAKEYA H., TAKANO Y.
Journal of Physics: Conference Series, vol.667, no.12003, 2016 (Scopus)
- V. **"The physical and magnetic properties of FeSe₁₁ superconductor**
IŞIK C., KANTARCI GÜLER N., GÜRSUL M., EKİCİBİL A., ÖZÇELİK B.
Journal of Physics: Conference Series, vol.667, no.12002, 2016 (Scopus)

Refereed Congress / Symposium Publications in Proceedings

- I. **Role of Bi-Site Zn substitution on structural, superconducting and magnetic features of Bi-2212**
KARAÇORA F., GÜRSUL M., ÖZÇELİK B.
1st International Conference on Engineering, Natural and Social Sciences, Konya, Turkey, 20 - 22 December 2022
- II. **DETERMINATION OF THE MOST SUITABLE CATIONIC SITE FOR NA-SUBSTITUTION IN Bi-2212 PHASE**

GÜRSUL M.

ANKARA INTERNATIONAL CONGRESS ON SCIENTIFIC RESEARCH-VI, Ankara, Turkey, 02 December 2022 - 04 January 2023

- III. **The influence of Ce substitution on structural and transport properties of CaMnO_3**
Gürsul M., Çetin G., Ergin İ., Sotelo A., Madre M. M., Özçelik B.
5 International Mediterranean Science and Engineering Congress, Antalya, Turkey, 21 - 23 October 2020, pp.729
- IV. **A Study on Thermoelectric Properties of $\text{Ca}_{1-x}\text{Sr}_x\text{MnO}_3$ Perovskite Oxides**
Gürsul M., Çetin G., Ergin İ., Sotelo A., M A M., Özçelik B.
4th International virtual Conference on Physical Chemistry & Functional Materials (PCFM'21), Elazığ, Turkey, 08 April 2021
- V. **Physical properties of NiO added Bi-2212 superconducting ceramics**
GÜRSUL M., ERGİN İ., ÖZÇELİK C.
5th International Mediterranean Science and Engineering Congress (IMSEC 2020), Antalya, Turkey, 21 - 23 October 2020
- VI. **Enhancement of the Low Temperature Thermoelectric Performance of Na-substituted $\text{Bi}_2\text{Sr}_2\text{Co}_2\text{O}_x$ Ceramics**
ÇETİN G., ÖZÇELİK B., GÜRSUL M., Sotelo A., Madre M., SHİNTARO A., YOSHİHİKO T.
International Conference on Condensed Matter and Material Science, Adana, Türkiye 14-19 Ekim 2019, 14 - 19 October 2019
- VII. **Synthesis, Composition and Structural Properties of Superconducting B-FeSe**
GÜRSUL M., ÖZÇELİK B.
4nd International Mediterranean Science and Engineering Congress (IMSEC 2019), 25 - 27 April 2019
- VIII. **Effect of Cs-substitution on $\text{Bi}_2\text{Sr}_2\text{Co}_2\text{O}_x$ Thermoelectric Materials**
ÖZÇELİK B., ÇETİN KARAKAYA G., GÜRSUL M.
5th International conference on materials science and nanotechnology for next generation (MSNG2018), 4 - 06 October 2018
- IX. **Thermoelectric and Magnetic Properties of $\text{Bi}_2\text{Sr}_2\text{Co}_{1.8-x}\text{Ti}_x\text{O}_y$ Ceramic**
ÇETİN G., GÜRSUL M., TORRES M., MADRE M. A., SOTELO A., ÖZÇELİK B.
International Conference on Physical Chemistry and Functional Materials (PCFM'18), Elazığ, Turkey, 19 - 21 June 2018
- X. **Remarks on FeSe Based Superconductors**
GÜRSUL M., ÖZÇELİK B.
International Conference on Physical Chemistry and Functional Materials (PCFM'18), Elazığ, Turkey, 19 - 21 June 2018
- XI. **ELECTRICAL PROPERTIES AND FLUX PINNING ENERGY OF $\text{Bi}_2\text{Sr}_2\text{Ca}_{1-x}\text{Na}_x\text{Cu}_2\text{O}_{8+\delta}$ FIBERS**
KARAÇORA NANE F., GÜRSUL M., ERGİN İ., MADRE M. A., SOTELO A., ÖZÇELİK B.
6th International Conference on Superconductivity and Magnetism (ICSM2018), Antalya, Turkey, 29 April - 04 May 2018
- XII. **SYNTHESIS, STRUCTURAL, AND MAGNETIC PROPERTIES OF THE IRON-SELENIDE $\text{Na}_x\text{K}_{0.8-x}\text{Fe}_2\text{Se}_2$**
GÜRSUL M., Liu M., Boltalin A., Morozov I. V., ÖZÇELİK B.
6th International Conference on Superconductivity and Magnetism (ICSM2018), Antalya, Turkey, 29 April - 04 May 2018
- XIII. **ELECTRICAL PROPERTIES AND FLUX PINNING ENERGY OF Y- SUBSTITUTED $\text{Bi}_2\text{Sr}_2\text{CaCu}_2\text{O}_{8+\delta}$ SUPERCONDUCTORS**
KARAÇORA NANE F., GÜRSUL M., ERGİN İ., MADRE M. A., SOTELO A., ÖZÇELİK B.
6th International Conference on Superconductivity and Magnetism (ICSM2018), Antalya, Turkey, 29 April - 04 May 2018
- XIV. **Processing of Superconducting and Thermoelectric Bulk Materials via Laser Technologies**
ÖZÇELİK B., ÇETİN G., GÜRSUL M., SOTELO A., MADRE M. A.
Functional Nanostructures and Sensors for CBRN Defence and Environmental Safety and Security "FNS-CBRN Defence - 2018, Chisinau, Moldova, 14 June - 17 April 2018

- XV. **EFFECT OF Na SUBSTITUTION ON SUPERCONDUCTING PROPERTIES, MAGNETORESISTANCE AND FLUX PINNING ENERGY OF Bi-2212 CERAMICS PREPARED BY SINTER-FORGED PROCESS**
GÜRSUL M., KARAÇORA NANE F., SOTELO A., MADRE M. A., ÖZÇELİK B.
6th International Conference on Superconductivity and Magnetism (ICSM2018), Antalya, Turkey, 29 April - 04 May 2018
- XVI. **Effects of Rotor Material on Eddy Current Brake Performance**
Uluocak İ., Yavuz H., Gürsul M.
2nd International Mediterranean Science and Engineering Congress, Adana, Turkey, 25 - 27 October 2017
- XVII. **Synthesis, crystal structure and magnetic properties of the Iron Selenide CeFe₂Se₂**
GÜRSUL M., ÖZÇELİK B.
2nd International Mediterranean Science and Engineering Congress (IMSEC 2017), 25 - 27 October 2017
- XVIII. **Improvement of the thermoelectric properties of Bi₂Sr₂Co_{1.80}y by K substitution**
GÜRSUL M., ÖZÇELİK B., TORRES M. A., MADRE A., SOTELO A.
2nd International Mediterranean Science and Engineering Congress (IMSEC2017), Adana, Turkey, 25 - 27 October 2017, pp.6
- XIX. **Synthes?s, crystal structure and magnet?c propert?es of the Iron Selen?de CeFe₂Se₂**
GÜRSUL M., ÖZÇELİK B.
2nd International Mediterranean Science and Engineering Congress (IMSEC2017), Adana, Turkey, 25 - 27 October 2017, pp.611
- XX. **Effects of Ti Substitution on Thermoelectric Properties of Bi₂Sr₂Co_{1.80}y Ceramic Textured by Lazer Floating Zone (LFZ) Technique**
ÖZÇELİK B., GÜRSUL M., Torres M. A., Sotelo A., Madre M.
International Conference on Condensed Matter and Material Science, Adana,Türkiye, 11 - 15 October 2017
- XXI. **Improvement of the Superconducting Properties of FeSe_{0.4}Te_{0.6} by Increasing Cooling Rate**
GÜRSUL M., ÖZÇELİK B.
International Conference on Condensed Matter and Materials Science, Adana, Turkey, 11 - 15 October 2017, pp.56
- XXII. **Effects of Ti Substitution on Thermoelectric Properties of Bi₂Sr₂Co_{1.80}y Ceramic Textured by Laser Floating Zone (LFZ) Technique**
ÖZÇELİK B., GÜRSUL M., Sotelo A., Madre M., Torres M.
INternational Conference on Condensed Matter and Materials Science, Adana, Turkey, 11 - 15 October 2017, pp.116
- XXIII. **Effect of Na Substitution on the Physical, Magnetoresistivity and Flux Pinning Energy of the Bi₂Sr₂Ca_{1-x}Na_xCu₂O₈+?Superconductors**
ÖZÇELİK B., GÜRSUL M., SOTELO A., MADRE A.
4th International conference on materials science and nanotechnology for next generation (MSNG2017), Saraybosna, Bosnia And Herzegovina, 28 - 30 June 2017, pp.19
- XXIV. **Synthesis Properties of FeSe Based Superconductors**
GÜRSUL M., ÖZÇELİK B.
4th International conference on materials science and nanotechnology for next generation (MSNG2017), Saraybosna, Bosnia And Herzegovina, 28 - 30 June 2017, pp.59
- XXV. **Structural and Magnetic Properties of the Iron Selenide K_{0.64}Na_{0.16}Fe₂-ySe₂**
GÜRSUL M., LİU M., Morozov I., ÖZÇELİK B.
4th International conference on materials science and nanotechnology for next generation (MSNG2017), Saraybosna, Bosnia And Herzegovina, 28 - 30 June 2017, pp.189
- XXVI. **Characterization of the phase composition crystal structure and magnetic properties of the iron selenide BaFe₂Se₂**
GÜRSUL M., EKİCİBİL A., ÖZÇELİK B.
1st International Mediterranean Science and Engineering Congress (IMSEC 2016), Adana, Turkey, 26 - 28 October 2016
- XXVII. **Effect of Sintering Temperature on the Activation Energy of the Bi₂Sr₂Ca_{0.9}Na_{0.1}Cu₂O₈+δ Superconductor**

GÜRSUL M., ÖZÇELİK B., YAKINCI M. E., SOTELO A., MADRE M. A.

7th Asian Conference on Applied Superconductivity and Cryogenics (ACASC), Nevşehir, Turkey, 23 - 25 October 2013

XXVIII. Diffusion Rate of Mg in B and B in Mg during MgB₂ Fabrication

GÜRSUL M., ALTIN S., AKSAN M. A., YAKINCI M. E.

The 5th National Superconductivity Symposium (USS5 2011), İzmir, Turkey, 3 - 06 July 2011

XXIX. Effect of Na-substitution on the activation energies of Bi-2212 Superconductor

GÜRSUL M., ÖZÇELİK B., YAKINCI M. E., SOTELO A., MADRE M. A.

4th International Congress on Superconductivity and Magnetism (ICSM2014), Antalya, Turkey, 27 April - 02 May 2014

Other Publications

I. Ç.Ü. FEF Ders Notu Genel Fizik III Laboratuvarı

UFUKTEPE Y., KARAKILÇIK M., YÜKSEL M., AKYOL M., AKÇA G., AKÇA S., GÜRSUL M., ŞEKER(ZAİMOĞLU) Z., ÇETİN G., YEĞEN S. B., et al.

Lecture Note, pp.145, 2015

II. Genel Fizik III Laboratuvarı

UFUKTEPE Y., Karakılçık M., YÜKSEL M., AKYOL M., AKÇA G., AKÇA S., GÜRSUL M., ŞEKER(ZAİMOĞLU) Z., ÇETİN G., Balcı Yegen S., et al.

Experiment, pp.1, 2015

Supported Projects

GÜRSUL M., ÇETİN G., Ergin İ., Project Supported by Higher Education Institutions, Ce ve Sr katkılı CaMnO₃ malzemesinin termoelektrik özelliklerinin araştırılması, 2020 - 2023

ÖZÇELİK B., GÜRSUL M., ÇETİN G., Project Supported by Higher Education Institutions, Cs Katkısının Bi₂Sr₂Co₂O_x Termoelektrik Malzemeleri Üzerine Etkisi, 2018 - 2019

ÖZÇELİK B., GÜRSUL M., Project Supported by Higher Education Institutions, FeSe Tabanlı Kristallerin Üretimi Karakterizasyonu ve Fiziksel Özelliklerinin Araştırılması, 2015 - 2019

ÖZÇELİK B., GÜRSUL M., Project Supported by Higher Education Institutions, Ti Katkısının LFZ tekniğiyle üretilmiş Bi₂Sr₂Co₂O_x Termoelektrik Malzemeleri Üzerine Etkisi, 2017 - 2018

ÖZÇELİK B., GÜRSUL M., Project Supported by Higher Education Institutions, Seramik Tabanlı Termoelektrik Malzemelerin Üretimi, 2017 - 2017

Metrics

Publication: 72

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Citation (Scopus): 116

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H-Index (Scopus): 6