



Hanieh Nokhbatolfoghahaei

DDS, PhD

H-Index (Scopus): 15

H-Index (Google Scholar): 19

Address: Dental Research Center, Research Institute of Dental Sciences, Dental School, Shahid Beheshti University of Medical Sciences, Velenjak, Tehran, Iran.

Phone (Cellphone): +98-9122905305

Email: Hanieh.nokhbe@gmail.com / haniehnokhbeh@gmail.com / Hanieh.nokhbe@sbmu.ac.ir

Date of Birth: 1st of January 1985

Scopus: 56018648300

Google Scholar: <https://scholar.google.com/citations?user=8lZFOhEAAAJ>

Researchgate: <https://www.researchgate.net/profile/Hanieh-Nokhbatolfoghahaei>

ORCID: 0000-0002-6154-4349

ResearcherID: ABA-6074-2021

Microsoft Academic: <https://academic.microsoft.com/profile/9g859g6e-650f-4378-968j-50610jeh4550/HaniehNokhbatolfoghahaei/no-publications>

RESEARCH INTERESTS

Regeneration Medicine, Bone Tissue Engineering, Bioreactors, 3D Cell Culture, 3D & 4D printing, Bioprinting, Lasers in Dentistry, Low Level Laser Therapy, Craniofacial Regeneration, Dental/oral tissue-derived stem cells

EDUCATION

2016- 2021 PhD in Tissue Engineering

Shahid Beheshti University of Medical Sciences, Research Institute of Dental Sciences, Dental School, Tehran, Iran. Under Supervision of Prof. Arash Khojasteh, Dissertation Title: Fabrication of acellular functionalized scaffold for bone tissue engineering in maxillofacial region

2003-2009 D.D.S

Islamic Azad University, Dental Branch, Tehran, Iran. Under Supervision of Dr. Mohsen Tamizi, Dissertation Title: The effect of different treatment of teeth on tensile bond strength of composite artificial to acryl. GPA: 3.5

PROFESSIONAL ASSOCIATIONS

World Association for Photobiomodulation Therapy (WALT)
International Association for Dental Research (IADR)
Oral and Maxillofacial Research Group (OMFR)

ACADEMIC EXPERIENCES/RESEARCHES

2023-Now: Reviewer in MDPI Publisher

2021-Now: Chief head of cellular and molecular lab

2021-Now: Associate Editor and Deputy Editor in Regeneration, Reconstruction & Restoration (Triple R) Journal

2021-Now: Executive Guest Editor. Journal of Current Stem Cell & Research Therapy

2020-Now: Research Manager of Dental Research Center

2010-Now: Reviewer in Journal of Lasers in Medical Sciences (ISI)

2018-Now: Reviewer in Regeneration, Reconstruction & Restoration (Triple R) Journal

2018: Head of Executive committee in 13th Annual Meeting of the Iranian Division of IADR, Tehran, Iran

2018: Member of Scientific committee in 13th Annual Meeting of the Iranian Division of IADR, Tehran, Iran

2018: Chairman of Oral and Maxillofacial Tissue Engineering Platform at ITERM 2018, Tehran, Iran

2015-2016: Research assistant in School of Advanced Technologies in Medicine, Shahid Beheshti University of Medical Sciences, Tehran, Iran

2010-2015: Research Assistant in Laser Research Center of Dentistry, Research Institute of Dental Sciences, Tehran University of Medical Sciences, Tehran, Iran.

SELECTED PUBLICATIONS

Published Papers

1. Safiaghdam H, Baniameri S, Aminianfar H, Mohajeri SF, Dehghan MM, Tayebi L, Nokhbatolfoghaei H, Khojasteh A. Evaluating osteogenic potential of a 3D-printed bioceramic-based scaffold for critical-sized defect treatment: an in vivo and in vitro investigation. In Vitro Cellular & Developmental Biology-Animal. 2024 May 14:1-0.
(IF: 2.1)
(Corresponding author)
2. Atarbashi-Moghadam F, Azadi A, Nokhbatolfoghaei H, Taghipour N. Effect of Simultaneous and Sequential Use of TGF- β 1 and TGF- β 3 with FGF-2 on Teno/Ligamentogenic Differentiation of Periodontal Ligament Stem Cells. Archives of Oral Biology. 2024 Mar 13:105956.
(IF: 3)

3. Mohaghegh S, Fathi H, Molaasadollah F, Teimoori M, Chiniforush N, Taghipour N, Shekarchi F, **Nokhbatolfoghaei H**. Evaluating the effect of strontium ranelate and photobiomodulation on cementogenic and osteogenic differentiation of buccal fat pad-derived stem cells: An in vitro study. Photochemistry and Photobiology. 2024 Jan 18.
(IF: 3.3)
(Corresponding author)
4. **Nokhbatolfoghaei H**, Niroomand A, Chiniforush N, Najary S, Shekarchi F. The effect of antibacterial photodynamic therapy with diode laser on chromogenic bacteria associated with dental black staining: An in-vitro study. Photodiagnosis and Photodynamic Therapy. 2023 Dec 1;44:103761.
(IF: 3.3)
(First author)
5. Mohaghegh S, Boroojeni HS, **Nokhbatolfoghaei H**, Khojasteh A. Application of biodegradable Patient-specific scaffolds for maxillofacial bone regeneration: a scoping review of clinical studies. British Journal of Oral and Maxillofacial Surgery. 2023 Sep 7.
(IF:1.8)
6. Yousefi-Koma AA, Assadian H, Mohaghegh S, **Nokhbatolfoghaei H**. Comparative Biocompatibility and Odonto-/Osteogenesis Effects of Hydraulic Calcium Silicate-Based Cements in Simulated Direct and Indirect Approaches for Regenerative Endodontic Treatments: A Systematic Review. Journal of Functional Biomaterials. 2023 Aug 29;14(9):446.
(IF: 4.9)
(Corresponding author)
7. Teimoori M, **Nokhbatolfoghaei H**, Khojasteh A. Bilayer scaffolds/membranes for bone tissue engineering applications: a systematic review. Biomaterials advances. 2023 Jun 15:213528.
(IF: 7.9)

8. Bohlouli M, Bastami F, **Nokhbatolfoghaei H**, Khojasteh A. Tissue buccal fat pad-stromal vascular fraction as a safe source in maxillofacial bone regeneration: A clinical pilot study. *Journal of Plastic, Reconstructive & Aesthetic Surgery*. 2023 Apr 1;79:111-21.
(IF: 3.022)
9. Safiaghdam H, **Nokhbatolfoghahei H**, Farzad-Mohajeri S, Dehghan MM, Farajpour H, Aminianfar H, Bakhtiari Z, Jabbari Fakhr M, Hosseinzadeh S, Khojasteh A. 3D-printed MgO nanoparticle loaded polycaprolactone β-tricalcium phosphate composite scaffold for bone tissue engineering applications: In-vitro and in-vivo evaluation. *Journal of Biomedical Materials Research Part A*. 2023 Mar;111(3):322-39.
(IF: 4.854)
10. Khojasteh A, Safiaghdam H, **Nokhbatolfoghahei H**, Mohaghegh S. Periosteum as a covering vascular flap in posterior mandibular augmentation: A retrospective cohort study. *Journal of Stomatology, Oral and Maxillofacial Surgery*. 2023 Feb 1;124(1):101352.
(IF: 2.480)
11. Assadian H, Khojasteh A, Ebrahimian Z, Ahmadinejad F, Boroojeni HS, Bohlouli M, Nekoofar MH, MH DUMMER P, **Nokhbatolfoghahei H**. Comparative evaluation of the effects of three hydraulic calcium silicate cements on odontoblastic differentiation of human dental pulp stem cells: an in vitro study. *Journal of Applied Oral Science*. 2022 Nov 4;30.
(IF: 3.144)
(Corresponding author)
12. Nokhbatolfoghahei H, Rad MR, Paknejad Z, Ardeshirylajimi A, Khojasteh A. Identification osteogenic signaling pathways following mechanical stimulation: A systematic review. *Current stem cell research & therapy*. 2022 Nov 1;17(8):772-92.
(IF: 3.758)

13. Shekarchi F, **Nokhbatolfoghahaei H**, Chiniforush N, Mohaghegh S, Haeri Boroojeni HS, Amini S, Biria M. Evaluating the Preemptive Analgesic Effect of Photo-biomodulation Therapy on Pain Perception During Local Anesthesia Injection in Children: A Split-mouth Triple-blind Randomized Controlled Clinical Trial. *Photochemistry and Photobiology*. 2022 Sep;98(5):1195-200.
(IF: 3.521)
14. Hazrati P, Mirtaleb MH, Boroojeni HS, Koma AA, **Nokhbatolfoghahaei H**. Current Trends, Advances, and Challenges of Tissue Engineering-Based Approaches of Tooth Regeneration: A Review of The Literature. *Current Stem Cell Research & Therapy*. 2022 Aug 18.
(IF: 3.758)
(Corresponding Author)
15. **Nokhbatolfoghahaei H**, Bastami F, Farzad-Mohajeri S, Rezai Rad M, Dehghan MM, Bohlouli M, Farajpour H, Nadjmi N, Khojasteh A. Prefabrication technique by preserving a muscular pedicle from masseter muscle as an in vivo bioreactor for reconstruction of mandibular critical-sized bone defects in canine models. *Journal of Biomedical Materials Research Part B: Applied Biomaterials*. 2022 Jul;110(7):1675-86.
(IF: 3.405)
(First Author)
16. Rad MR, Fahimipour F, Dashtimoghadam E, **Nokhbatolfoghahaei H**, Tayebi L, Khojasteh A. Osteogenic differentiation of adipose-derived mesenchymal stem cells using 3D-Printed PDLLA/ β -TCP nanocomposite scaffolds. *Bioprinting*. 2021 Mar 1; 21:e00117.
17. Salehi M, Bastami F, Rezai Rad M, **Nokhbatolfoghahaei H**, Paknejad Z, Nazeman P, Hassani A, Khojasteh A. Investigation of cell-free poly lactic acid/nanoclay scaffolds prepared via thermally induced phase separation technique containing hydroxyapatite nanocarriers of erythropoietin for bone tissue engineering applications. *Polymers for Advanced Technologies*. 2021 Feb;32(2):670-80.

(IF= 2.578)

18. **Nokhbatolfoghahaei H**, Paknejad Z, Bohlouli M, Rezai Rad M, Aminishakib P, Derakhshan S, Mohammadi Amirabad L, Nadjmi N, Khojasteh A. Fabrication of Decellularized Engineered Extracellular Matrix through Bioreactor-Based Environment for Bone Tissue Engineering. ACS omega. 2020 Dec 2.

(IF= 2.87)

(First author)

19. Pirmoradian M, Safiaghdam H, **Nokhbatolfoghahaei H**, Ashnagar S, Fekrazad R. Effect of Photobiomodulation on Relapse in an Experimental Rapid Maxillary Expansion (RME) Model in Rat. Photochemistry and Photobiology. 2020 Dec 9.

(IF=2.721)

20. Naghizadeh Z, Karkhaneh A, **Nokhbatolfoghahaei H**, Farzad-Mohajeri S, Rezai-Rad M, Dehghan MM, Aminishakib P, Khojasteh A. Cartilage regeneration with dual-drug-releasing injectable hydrogel/microparticle system: In vitro and in vivo study. Journal of Cellular Physiology.

(IF: 5.546)

21. **Nokhbatolfoghahaei H**, Bohlouli M, Adavi K, Paknejad Z, Rezai Rad M, khani MM, Salehi-Nik N, Khojasteh A. Computational modeling of media flow through perfusion-based bioreactors for bone tissue engineering. Journal of Engineering in Medicine. Part H.

(IF:1.3)

(First author)

22. Khojasteh A, Dehghan MM, Motamedian SR, Farzad-Mohajeri S, Nazeman P, Morad G, **Nokhbatolfoghahaie H**, Alikhasi M. Local and systemic administration of mesenchymal stem cells in regeneration of mandibular defects: an experimental study. Journal of "Regeneration, Reconstruction & Restoration", Vol. 5 (2020), 24 March 2020 , Page e10.

23. Bohlouli M, Nokhbatolfoghahei H, Rasouli-Ghahroudi AA, Khojasteh A. Effect of Vitamin K2 as A Stimulants of Bone Regeneration in Osteoporosis Therapy. Journal of "Regeneration, Reconstruction & Restoration" (Triple R), Vol. 5 No. 1 (2020), 24 March 2020, Page e5
24. Nokhbatolfoghahei H, Bohlouli M, Paknejad Z, Maryam R. Rad, Mohammadi Amirabad L, Rezaie Rad M, Salehi-Nik N, Khani MM, Shahriari Sh, Nadjmi N, Ebrahimpour A, Khojasteh A. Bioreactor cultivation condition for engineered bone tissue: Effect of various bioreactor designs on extra cellular matrix synthesis. Journal of Biomedical Materials Research Part A, 2020. March 19.
(IF: 3.2)
(First author)
25. Aghdam H, Nokhbatolfoghahei H, Khojasteh A. Therapeutic metallic ions in bone tissue engineering: A systematic review of the literature. Iranian Journal of Pharmaceutical Research (IJPR). 2019 Dec 1;18:101-18.
(IF: 1.5)
26. Ghazanfari R, Azimi N, Nokhbatolfoghahei H, Alikhasi M. Laser aided ceramic restoration removal: a comprehensive review. J Lasers Med Sci. 2019;10(2):86-91.
(IF: 0)
(Corresponding author)
27. Alikhasi M, Yaghoub zadeh B, Mansourian A, Nokhbatolfoghahei H. Detection of residual excess ZnO-based cement with laser fluorescence (DIAGNOdent): in vitro evaluation. Journal of Oral Implantology. Journal of Oral Implantology. 2019;45(2):89-93.
(IF: 1.184)
(Corresponding author)

28. Heidari M, Fekrazad R, Sobouti F, Moharrami M, Azizi S, Nokhbatolfoghaei H, Maziar Khatami. Evaluating the effect of photobiomodulation with a 940-nm diode laser on post-operative pain in periodontal flap surgery. Lasers in Medical Science, Epub 2018.
(IF: 2.461)
(Corresponding author)
29. Shahabi S, Assadian H, Mahmoudi Nahavandi A, Nokhbatolfoghaei H. Comparison of Tooth Color Change After Bleaching with Conventional and Different Light-Activated Methods. J Lasers Med Sci. 2018 Winter; 9(1): 27–31.
(IF: 0)
(Corresponding author)
30. Nokhbatolfoghaei H, Rezaei Rad M, Khani M-M, Nadjmi N, Khojasteh A. Application of Bioreactors to Improve Functionality of Bone Tissue Engineering Constructs: A Systematic Review. Current Stem Cell Research & Therapy, 2017 October, 12(7): 564-599
(IF: 2.167)
(First author)
31. Heidari M, Paknejad M, Jamali R, Nokhbatolfoghaei H, Fekrazad R, Moslemi N. Effect of laser photobiomodulation on wound healing and postoperative pain following free gingival graft: A split-mouth triple-blind randomized controlled clinical trial. J Photochem Photobiol B. July 2017; 172: 109-114
(IF: 3.165)
32. Fekrazad R, Lotfi G, Harandi M, Ayremlou S, AM Kalhori K, Gholami G.A, Nokhbatolfoghaei Hanieh. Comparing fibroblast attachment in root surface scaling with Er, Cr:YSGG laser versus ultrasonic scaler: A SEM study. Microscopy Research and Technique, 2017 August; 80(8): 917-922
(IF: 1.147)

33. Ghazanfari R, Nokhbatolfoghaei H, Alikhasi M. Laser-aided ceramic bracket debonding: a comprehensive review. J Lasers Med Sci. 2016; 7(1):2-11.

(IF: 0)

34. Alaghehmand H, Nasrollah F.N, Nokhbatolfoghaei H, Fekrazad R. An in vitro comparison of the bond strength of composite to superficial and deep dentin, treated with Er:YAG laser irradiation or acid-etching. J Lasers Med Sci. 2016; 7(3):167-171.

(IF: 0)

35. Chiniforush N, Nokhbatolfoghaei H, Monzavi A, Pordel E, Ashnagar S. Surface treatment by different parameters of erbium:yttrium–aluminum–garnet (Er:YAG) laser: scanning electron microscope (SEM) evaluation. J Lasers Med Sci. 2016;7(1):37-39.

(IF: 0)

(Corresponding author)

36. Fekrazad R, Naghdi N, Nokhbatolfoghaei H, Bagheri H. The combination of laser therapy and metal nanoparticles in cancer treatment originated from epithelial tissues:a literature review. J Lasers Med Sci. 2016; 7(2):62-75.

(IF: 0)

(Corresponding author)

37. Hoseyni A.M, Pirmoradian-Najafabadi M, Ashnagar S, Nokhbatolfoghaei H, Fekrazad Reza. Effect of Low Level Laser Therapy on Pain Reduction After Midpalatal Expansion in Rats. Journal of Dentistry of Tehran University of Medical Sciences 2015. 12(9):655-661.

(Corresponding author)

38. Nemati Anaraki S, Shahabi S, Chiniforush N, Nokhbatolfoghaie H, Assadian H, Yousefi B. Evaluation of the effects of conventional versus laser bleaching techniques on enamel microroughness. Lasers in Medical Science. 2015 Apr;30(3):1013-8

(IF: 2.461)

(Corresponding author)

39. Fekrazad R, Nokhbatolfoghahaei H, Khoei F, Kalhori KA. Pyogenic Granuloma: Surgical Treatment with Er:YAG Laser. J Lasers Med Sci 2014; 5(4):199-205.

(IF: 0)

(Corresponding author)

40. Ashnagar S, Nowzari H, Nokhbatolfoghahaei H, Yaghoub Zadeh B, Chiniforush N, Choukhachi Zadeh N. Laser Treatment of Peri-Implantitis: A Literature Review. J Lasers Med Sci 2014; 5(4):153-62.

(IF: 0)

(Corresponding author)

41. Ghahramani L, Nokhbatolfoghahaei H, Shahabi S, Tamizi M, Fatemi M. The effect of different treatment of teeth on tensile bond strength of composite artificial to acryl. Journal of Dental Medicine-Tehran University of Medical Sciences. 2014;27(3):175-83

42. Moslemi N, Heidari M, Fekrazad R, Nokhbatolfoghahaei H, Yaghobee S, Shamshiri A, Paknejad M. Effect of 660nm low power laser on pain and healing in palatal donor sites; a randomized controlled clinical trial. Journal of Dental Medicine-Tehran University of Medical Sciences 2014; 27(1):71-77.

43. Nokhbatolfoghahaei H, AliKhasi M, Chiniforush N, Khoei F, Safavi N, Yaghoub Zadeh B. Evaluation of Accuracy of DIAGNOdent in Diagnosis of Primary and Secondary Caries in Comparison to Conventional Methods. Journal of Lasers in Medical Sciences, Volume 4, No 4, Autumn 2013.159-167.

(IF: 0)

(First author)

44. Nokhbatolfoghahaei H, Monzavi A, Barikani H, Abdian M, Fekrazad R. The application of laser bleaching in dentistry. Lasers in Medicine. 2012; 9 (2) :6-15

(First author)

45. Ebrahimi T, Moslemi N, Heidari M, Nokhbatolfoghaie H, Fekrazad R. The Influence of Low-Intensity Laser Therapy on Bone Healing. Journal of Dentistry of Tehran University of Medical Sciences 2012. 9(4):338-348.
46. Farid F, Hajmiragha H, Jelodar R, Mostafavi A. S., Nokhbatolfoghaie H. In Vitro Evaluation of the Effect of Core Thickness and Fabrication Stages on the Marginal Accuracy of an All-Ceramic System. Journal of Dentistry of Tehran University of Medical Sciences, Vol 9, No 3, 2012, 188-194
47. Nokhbatolfoghaie H, Chiniforush N, Shahabi S, Monzavi A. Scanning Electron Microscope (SEM) Evaluation of Tooth Surface Irradiated by Different Parameters of Erbium: Yttrium Aluminium Garnet (Er:YAG) Laser. Journal of Lasers in Medical Sciences, Vol 3, No 2, Spring 2012. 51-55.

(IF: 0)

(First author)

Book Chapters

1. Fekrazad R, Nokhbatolfoghaei H, Nikhalat M. Advances in lasers and nanoparticles in treatment and targeting of epithelial originated cancers. In Nanoarchitectonics for Smart Delivery and Drug Targeting. ISBN: 9780323473477 Elsevier (Authorship)
2. Hanieh Nokhbatolfoghaei, Zahrasadat Paknejad, Mahboubeh Bohlouli, Maryam Rezai Rad, Arash Khojasteh. Animal Models in Dental Research. In Application of Biomedical Engineering in Dentistry. 377-442. Springer (Authorship)

3. دکتر آرش خجسته، مترجمین به ترتیب حروف الفبا: دکتر فرشید بسطامی ، بهناز بنی محمد شتربانی، دکتر محبوبه بهلولی، فراز سیگارودی، حمکت فرجپور، دکتر حانیه نخبه الفقهایی. دستور العمل های تحقیق در مهندسی بافت استخوان. انتشارات رویان پژوه

4. Boroojeni HS, **Nokhbatolfoghaei H.** Application of Bioreactors in Oral and Maxillofacial Surgery. InEmerging Technologies in Oral and Maxillofacial Surgery 2023 Jul 26 (pp. 355-375). Singapore: Springer Nature Singapore.
5. **Nokhbatolfoghaei H.**, Khojasteh A. The Emergence of Advance Technologies and Industrial Revolutions. InEmerging Technologies in Oral and Maxillofacial Surgery 2023 Jul 26 (pp. 1-10). Singapore: Springer Nature Singapore.
6. Mohaghegh S, **Nokhbatolfoghaei H.** Application of Bioprinting Technology in Oral and Maxillofacial Surgery. InEmerging Technologies in Oral and Maxillofacial Surgery 2023 Jul 26 (pp. 345-354). Singapore: Springer Nature Singapore.

Conference Papers

1. **Nokhbatolfoghaei H.**, Shekarchi F. An investigation of the utilization of strontium ranelate and low power laser therapy on mesenchymal stem cells. WALT Congress (PBM2024London). 23-25th August, 2024, London, United Kingdom.
2. Shekarchi F, **Nokhbatolfoghaei H.** In vitro investigation of antimicrobial photodynamic therapy with methylene blue and indocyanine green on bacteria associated with staining of teeth. WALT Congress (PBM2024London). 23-25th August, 2024, London, United Kingdom.
3. **Nokhbatolfoghaei H.**. Acellular Functionalized Scaffold” the New Generation of Scaffold in Bone Tissue Engineering. 19th international congress of Iranian society of oral & maxillofacial surgeons. 21-25th February 2022. Tehran, Iran.
4. **Nokhbatolfoghaei**. Regeneration in Dentistry. Research Workshop in 17th Annual Congress of IADR. 26-28 January 2022. Tehran. Iran
5. **Nokhbatolfoghaei H.**, Rezaei Rad M, Khojasteh A. “Rotating & perfusion bioreactor” represents as a suitable choice for application in bone tissue engineering. 18th international congress of Iranian society of oral & maxillofacial surgeons. 9th Young Researchers Symposiums. 2020-02-18. Tehran, Iran.
6. **Nokhbatolfoghaei H.** Bone bioreactors, an attempt to fabricate functionalized bio-scaffold for tissue engineering. 1st ITERM Congress. July 18-20, 2018, Tehran, Iran
(Invited speaker)

7. **Nokhbatolfoghahaei H**, Rezaei Rad M, Khojasteh A. Bioreactor preconditioning to improve functionality of the engineered stem cells into bone lineage. Iranian Division of International Association for Dental Research (IADR). 10-12 January, 2018, Tehran, Iran (Invited speaker)
8. **Nokhbatolfoghahaei H**, Shahabi S, Mahmoudi Nahavandi A, Asadian H. The evaluation of tooth color change after laser bleaching with different wavelengths. The 15th congress of the world federation for laser dentistry. 17-19 July, 2016, Nagoya, Japan
9. Yaghoob zadeh B, **Nokhbatolfoghahaei H**. The effect of Low Level Laser Therapy in pain and wound healing after oral surgery. Laser Medicine Update Congress. 31 Dec 2014-2 Jan 2015, Tehran, Iran.
10. Chiniforush N, **Nokhbatolfoghahaei H**, Shahabi S. Laser application in esthetic dentistry. Laser Medicine Update Congress. 31 Dec 2014-2 Jan 2015, Tehran, Iran.
11. **Nokhbatolfoghahaei H**, Chiniforush N, Shahabi S. Laser assisted preventive dentistry. Laser Medicine Update Congress. 31 Dec 2014-2 Jan 2015, Tehran, Iran.
12. Chiniforush N, Monzavi A, Shahabi S, **Nokhbatolfoghahaei H**. The application of laser in prosthodontics. The 14th International Congress of Iranian Association of Prosthodontists. 2-5 Dec 2014, Milad tower, Tehran, Iran.
13. **Nokhbatolfoghahaei H**, Monzavi A, Ashnagar S, Chiniforush N. The application of lasers for reatment of peri implantitis. The 14th International Congress of Iranian Association of Prosthodontists. 2-5 Dec 2014. Milad tower, Tehran, Iran.
14. **Nokhbatolfoghahaei H**, Monzavi A, Yaghoob zadeh B. Laser & implant: from دلایل to reality. 4th National Dental Congress of Islamic Azad University. 1-3 October 2014, Tehran, Iran
15. **Nokhbatolfoghahaei H**, Nemati anaraki S, Shahabi S, Chiniforush N, Yousefi B. Microroughness evaluation of enamel surface after laser-activated. World Federation for Laser Dentistry (WFLD). 14th World Congress for Laser Dentistry. Paris 2nd-4th July 2014. Page 47
16. **Nokhbatolfoghahaei H**, Fekrazad R. The role of laser and nanoparticle in oral cancer management. 54th International Congress of the Iranian Dental Association. 6-9 May 2014, Tehran, Iran.

17. Seifi H, Sanaie B, **Nokhbatolfoghahaei H**, Shahabi S. The effect of low level laser therapy in the treatment of pain for orthodontics. 54th International Congress of the Iranian Dental Association. 6-9 May 2014, Tehran, Iran.
18. Sanaie B, Seifi H, **Nokhbatolfoghahaei H**, Shahabi S. Laser bleaching or conventional bleaching: two ways for dentists. 54th International Congress of the Iranian Dental Association. 6-9 May 2014, Tehran, Iran.
19. Yaghoob zadeh B, Saber K, Parhiz AR, **Nokhbatolfoghahaei H**. Gingival Pigmentation of melanin and treatment with diode laser (810 nm): Case report. 54th International Congress of the Iranian Dental Association. 6-9 May 2014, Tehran, Iran.
20. **Nokhbatolfoghahaei H**, Monzavi A. The effect of low level laser therapy on tooth movement. 11th International congress of Iranian Association of Orthodontists. 16-18 Oct 2013, Shiraz, Iran
21. Ghanavati H, Asgari N, **Nokhbatolfoghahaei H**, Chiniforoush N, Ghanavati Z. Could be laser replaced by the conventional methods in restorative dentistry? 13th congress of Iranian academy of restorative dentistry.23-25 October 2013, Olympic Hotel, Tehran, Iran.
22. Chiniforoush N, **Nokhbatolfoghahaei H**, Shahabi S. Photodynamic Therapy of dental caries: the evaluation of photosensitizer and different light sources. 13th congress of Iranian academy of restorative dentistry.23-25 October 2013, Olympic Hotel, Tehran, Iran.
23. **Nokhbatolfoghahaei H**, Chiniforush N, Shahabi S, Monzavi A. Evaluation of dentin surfaces irradiated by different powers of Er:YAG laser. 13th congress of Iranian academy of restorative dentistry.23-25 October 2013, Olympic Hotel, Tehran, Iran.
24. Chiniforush N , **Nokhbatolfoghahaei H**, Monzavi A, Shahabi S. Laser treatment of zirconia ceramic: evaluation of surface characteristic. 13th International Congress of Iranian Association of Prosthodontists. 26-29 Nov 2013, Tehran, Iran.
25. Yaghobzadeh B, **Nokhbatolfoghahaei H**, Ali Khasi M. Laser and implant: a new step in modern dentistry. 13th International Congress of Iranian Association of Prosthodontists. 26-29 Nov 2013, Tehran, Iran.
26. **Nokhbatolfoghahaei H**, Chiniforush N, Monzavi A. Conservative management of temporomandibular disorders (TMD) problems by low level laser therapy (LLLT). 13th International Congress of Iranian Association of Prosthodontists. 26-29 Nov 2013, Tehran, Iran.

27. Nokhbatolfoghahaie H, Chiniforush N, Shahabi S, Monzavi A. SEM evaluation of tooth surface irradiated by different parameters of Er:YAG laser. 7th congress of Iranian General Dentist's association. 5-8 February 2013, Tehran, Iran.
28. Ghanavati H, Nokhbatolfoghahaei H, Chiniforoush N, Asgari N, Ghanavati Z. Could be laser replaced by the conventional methods in restorative dentistry? 3rd National Dental Congress of Islamic Azad University. 18-20 Sep 2013, Tehran, Iran
29. Nokhbatolfoghahaie H, Fekrazad R. Dental hypersensitivity. 3rd National Dental Congress of Islamic Azad University. 18-20 Sep 2013, Tehran, Iran
30. Moslemi N, Nokhbatolfoghahaei H, Ebrahimi T, Rokn HR, Heydari M, Fekrazad R. The Influence of Low-Intensity Laser Therapy on Bone Healing.
31. Mohammadi khah M, Chiniforush N, Nokhbatolfoghaie H, Shahabi S. Laser assisted scaling and root planning. 7th annual congress of Iranian medical laser association. 16-18 January 2013, Tehran, Iran.
32. Nokhbatolfoghahaei H. Enamel Surface modification exposed to laser bleaching and conventional bleaching. Iranian International Congress of Dental Biomaterials Updates - 2012, 5 - 7 Dec. 2012 ; Tehran – Iran
33. Keihan H, Nokhbatolfoghahaei H, Fekrazad R. Effect of low level laser therapy with diode lasers (red & infra-red) on human sperm motility. The 9th World Association for Laser Therapy Congress. 28-30 Sep 2012, QT Gold Coast, Surfers Paradise, Australia
34. Pordel E, Chiniforush N, Nokhbatolfoghahaei H, Shahabi S. Surface treatment by different parameters of Er:YAG laser: SEM evaluation. Euroean Stuent Conference, 17-21 Sep 2012, Berlin, Germany.
35. Nokhbatolfoghahaei H, Khoei F, Fekrazad R. Evaluation of laser in dental bleaching. Second national dental congress of Islamic Azad University.19-21 sep 2012, Tehran, Iran.
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44. **Nokhbatolfoghahaie H**, Johari M, Shahabi S, Chiniforush N. Ozon therapy application in endodontic treatments. 6th Congress of Iranian General Dentists Association; 10-13 Jan 2012, Olympic Hotel, Tehran, IRAN, Page: 308.
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53. **Nokhbatolfoghahaie H**, Chiniforush N, Shahabi S. The application of CBCT in the diagnosis of root resorption. The 3rd Congress Iranian Association of Oral and Maxillofacial Radiology, 16-18 Feb 2011, Tehran, Iran.
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TEACHING

- **2024:** Biocompatibility. Dental School, Tehran University of Medical Sciences.
- **2023:** Critical Appraisal. Dental School, Shahid Beheshti University of Medical Sciences.
- **2023:** Biocompatibility. Dental School, Tehran University of Medical Sciences.
- **2022:** Critical Appraisal. Dental School, Shahid Beheshti University of Medical Sciences.
- **2022:** Biocompatibility. Dental School, Tehran University of Medical Sciences.
- **2021:** Biocompatibility. Dental School, Tehran University of Medical Sciences.
- **2020:** Biocompatibility. Dental School, Tehran University of Medical Sciences.
- **2014:** Laser application for treatment and management of oral lesions. Dental School, Tehran University of Medical Sciences.
- **2014:** Laser application for treatment and management of oral lesions. Dental School, Ghazvin University of Medical Sciences.
- **2013:** Lasers for pain management. Dental School, Tehran University of Medical Sciences.
- **2013:** Laser application for treatment and management of oral lesions. Dental School, Babol University of Medical Sciences.
- **2012:** Laser Physics. Dental School, Tehran University of Medical Sciences.
- **2011:** Lasers in Periodontology. Dental School, Tehran University of Medical Sciences.
- **2011:** Lasers in Endodontology. Dental School, Tehran University of Medical Sciences.
- **2010:** Lasers in prosthodontics. Dental School, Tehran University of Medical Sciences.
- **2010:** Lasers in Pediatric dentistry. Dental School, Tehran University of Medical Sciences.

Research Proposal and Project

	Project Name	Center	PI/Co-PI/ Coolaborator/ Reviewer	University
1	Comparative Biocompatibility and Odonto-/Osteogenesis Effects of Hydraulic Calcium Silicate-based Cements in Simulated Direct and Indirect Approaches for	Dental Research Center	PI	Shahid Beheshti University Of Medical Sciences

	Regenerative Endodontic Treatments: A Systematic Review			
2	comparing the effect of photobiomodulation therapy by two types of infrared and red lasers on pain perception of infra alveolar nerve block anesthesia injection in 6-9 years old children	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
3	Synergistic Effects of Deferoxamine and N-acetyl-l-cysteine loaded on Gelatin/Alginate/Allograft Hydrogel on Osteogenesis and Angiogenic potential of Buccal fat pad-derived stem cells	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
4	Bilayer scaffolds/membranes for bone tissue engineering applications; A systematic review	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
5	Fabrication of mineralized hydrogel scaffolds with injectable PRF for bone regeneration	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
6	A comparative study of simultaneous two types of low level laser therapy in the combination of strontium ranlate on the differentiation of buccal fat pad stem cells towards cementoblast.	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
7	Evaluating the effect of photodynamic therapy with diode laserof 660 and 808 nanometer on chromogenic bacteria associated with dental black stain: in vitro study	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
8	fabrication of decellularized leave-derived scaffold and hydrogel for co-culture of two types of cells for bone tissue engineering	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
9	Fabrication of Synthetic BFP-derived Mesenchymal Stem Cell-laden Hydrogel Membrane for Bone Regeneration	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
10	Characterization of Mineral Reinforced Hydrogel Scaffolds	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
11	Ultrastructural and biodegradation evaluation of activated plasma albumin gel: An in vitro study	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
12	Evaluating the efficacy of low level laser therapy in decreasing the injection pain and post treatment pain in primary teeth	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
13	Investigating cementoblastic differentiation of buccal fat pad stem cells following the combination of strontium ranlate and low level laser therapy	Dental Research Center	Collaborator	Shahid Beheshti University Of Medical Sciences
14	Fabrication and characterization of beta tri-calcium phosphate (β -TCP) granules coated with gelatin for controlled delivery of purmorphamine with application of buccal fat pad stem cells in regeneration of surgical defects in rat cranium	Regenerative Medicine & Stem cell Research Network	Collaborator	Shahid Beheshti University Of Medical Sciences
15	Design and manufacturing of combined bioreactor(Perfusion & Rotating) system for bone tissue engineering applications	School of Advanced Technologies in Medicine	Collaborator	Shahid Beheshti University Of Medical Sciences
16	Investigation of cardiac differentiation of iPS cells cultured on electroactive nanofibrous Polyacrylonitrile/Polyaniline/nanosilver scaffolds in response to applying electrical impulses using bioreactor	School of Advanced Technologies in Medicine	Collaborator	Shahid Beheshti University Of Medical Sciences

17	Production of cellular artificial skin using multilayer nanofibrous cellulose scaffolds	School of Advanced Technologies in Medicine	Collaborator	Shahid Beheshti University Of Medical Sciences
18	Vascularized bone tissue-engineered grafts for regeneration of craniofacial skeletal defects	School of Advanced Technologies in Medicine	Collaborator	Shahid Beheshti University Of Medical Sciences
19	Generation of bioengineered human tooth as organ regenerative therapy	School of Advanced Technologies in Medicine	Collaborator	Shahid Beheshti University Of Medical Sciences
20	Evaluation of prefabricated customized bone graft in treatment of mandibular defects in canine models	NIMAD	Collaborator	Shahid Beheshti University Of Medical Sciences
21	Designing and characterization of a gel-particle system stimulating stem cells differentiation with anti-inflammatory property for cartilage regeneration	NIMAD	Collaborator	Shahid Beheshti University Of Medical Sciences
22	در دو ضایعه آملوبلاستوما و کیست دنتیجروس و BMP4 بررسی بروز تقواوت های احتمالی بروز آن به روش ایمونو هستو شیمی	Dental School	Reviewer	Shahid Beheshti University Of Medical Sciences
22	طراحی و ارزیابی پلیمر نوین زانتان عامل دار شده با دی پیتید کاربوزین با هدف بهبود پتانسیل کاربرد در فرمولاسیون های نوین درمانی مورد استفاده در دندانپزشکی	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
23	مقایسه روند ترمیم پس از کاربرد زنگرفت با منشا های متفاوت در ضایعات استخوانی با اندازه بحرانی در استخوان کالواریا خرگوش	Dental School	Reviewer	Shahid Beheshti University Of Medical Sciences
24	در سه ضایعه آملوبلاستوما، انتوتیزیک کراتوسیست TUG1 و NEAT1 و کیست دنتی ژروس	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
25	بررسی میزان رها سازی یون نقره و مینرالیز اسپیون سلول های رده کشته داده شده بر دیسک های تیتانیومی پوشش یافته با MC3T3-E1 نانوذرات هیدروکسی آپاتیت و نقره/استرانسیوم به روش الکتروشیمیایی: یک مطالعه ازمایشگاهی	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
26	ساخت و مشخصه یابی سیمان استخوانی کلسیم فسفات حاوی میکروذرات PEEK/PLGA	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
27	تأثیر وارد کردن نیروهای مکانیکی بر رفتار سلول های بنیادی استخراج شده از بافت های دندانی: مرور نظام مند مقالات	Dentofacial Deformities Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
28	تأثیر استفاده از داربست های آلوجرفت به همراه متغور مین بر رفتار سلول های بنیادی پالپ دندان	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
29	و i-PRF (Injectable platelet rich fibrin) (بررسی و مقایسه اثر در حیات و بیان ژن های Concentrated growth factor(CGF) (استوژنیک در سلول های بنیادی جاذبه از چربی گونه به صورت آزمایشگاهی.	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
30	مقایسه روند ترمیم پس از کاربرد زنگرفت با منشا های متفاوت در ضایعات استخوانی با اندازه بحرانی در استخوان کالواریا خرگوش	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences

31	بررسی ویژگی ها و اثر آنتی میکروبیال و استحکام باند برشی ادھریو ارتودنتیک سنتز شده آزمایشگاهی حاوی نانوپارتنیکل های زینک اکساید	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
32	در سه ضایعه آملوبلاستوما، NFKB بررسی الگوی بیان ژنهای مسیر انتروژنیک کراتوسیست و کیست دنتی ژروس	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
33	های IncRNA و D بررسی الگوی بیان ژنهای مسیر متabolیسم ویتامین مرتبط با آن در سه ضایعه آملوبلاستوما، انتروژنیک کراتوسیست و کیست دنتی ژروس	Dental Research Center	Reviewer	Shahid Beheshti University Of Medical Sciences
34	Comparison of colour change of teeth after office bleaching with conventional and different light-activated methods :CO2 Laser ,Diode Laser, Er:YAG Laser,Nd:YAG Laser, KTP laser, ,LED lamp ,Plasma Arc lamp	Laser Research Center of Dentistry	PI	Tehran University of Medical Sciences
35	The effect of Low-Level Laser Therapy(diode) on patient`s pain and Healing of Palatal Donor Site following Free Gingival Graft: A randomized controlled clinical trial	Laser Research Center of Dentistry	Collaborator	Tehran University of Medical Sciences
36	Synthesis of sol-gel-derived bioactive glass and evaluation of CO2 and Nd:YAG lasers on optimizing surface properties	Laser Research Center of Dentistry	Collaborator	Tehran University of Medical Sciences
37	The evaluation of the effect of two methods of office bleaching (conventional & laser)on the microroughness of the enamel surface	Laser Research Center of Dentistry	PI	Tehran University of Medical Sciences
38	Evaluation of demineralization in cavities prepared by bur & Er:YAG laser and restored with different restorative materials.	Laser Research Center of Dentistry	PI	Tehran University of Medical Sciences
39	Pretreatment of oral injection site by Er:YAG and CO2 laser	Laser Research Center of Dentistry	Collaborator	Tehran University of Medical Sciences
40	Effect of Er,Cr:YSGG laser combined with Fluoride on the prevention of primary tooth enamel demineralization	Laser Research Center of Dentistry	Collaborator	Tehran University of Medical Sciences
41	A comparison between conventional pulpcap therapy with MTA and laser assisted pulpcap therapy with MTA(clinical trial)	Laser Research Center of Dentistry	Collaborator	Tehran University of Medical Sciences

SELECTED HONORS/ AWARDS/ GRANTS

2016: Research grant, Ministry of Health and Medical Education, Tehran, Iran

References

Arash Khojasteh

DMD, OMFS, FDS, RCPS, PhD

Dean, School of Advanced Technologies in Medicine,
Shahid Beheshti University of Medical Sciences, Tehran, Iran

Email: arashkhojasteh@yahoo.com

Tel: +98-9121060032