

SCIENTIST

Professional Summary

- Self-motivated interdisciplinary researcher with 10 years of Laboratory Practices experience resulted in 13 scientific publications and 1 provisional patent
- Contributing to the discovery (formulation and pre-formulation) of anti-cancer and anti-bacterial pharmaceutical products, knowledgeable of FDA regulations
- Capable of working independently and supervising teams of various talents to deliver quality projects in multidisciplinary areas, successfully supervising over 10 junior chemists and bioengineers
- Instructing applications of Nanotechnology and Transdermal Drug Delivery to chemistry students at the University of California, Riverside

Skills

- Spectroscopy (UV-visible, FTIR, fluorescence)
- HPLC
- NMR
- ICP
- Surface Chemistry
- Nanoparticles Synthesis & Characterization
- Polymer chemistry
- Adhesion measurements & Instron,
- Dynamic light scattering
- Data analysis
- Experimental design
- Microsoft Excel
- Problem solving
- Product management
- Project Management
- Skin Delivery (transdermal)
- Research and experiments
- Biology, Skin Care
- Chemistry, UV
- Data analysis
- Validating data
- Delivery
- Designing
- Design of experiment
- Design software
- Experimental design
- Experiments
- FTIR
- HPLC
- Instructing
- Market
- Microsoft Excel
- NMR
- Presentations
- Problem solving
- Product management
- Project Management
- Publications
- Research
- Sales

Work History

Scientist , 11/2019 to Current

Abcam Plc – Fremont

- Use advanced skills in experimental design, data analysis, problem solving and data presentation.
- Research and development to introduce new formulation for middle ear and eye delivery and design of experiment to increase stability of existing formulation.
- Proposing new method for synthesizing polymeric particles, magnetic particles and hydrogel to increase transdermal drug delivery.
- In-vivo and in-vitro analysis of antibacterial drug delivery to ear, assist in in-vivo protocol design.
- Simultaneously managed several complex projects, meeting all pertinent milestones.

Researcher , 09/2014 to 10/2019

Research Affiliates

- Designing and innovating a reversible adhesion by changing the interactions of polymer to substrate (glass/tissue) and measuring it by some methods such as shear and pull off test (provisional patent filed).
- Developing reversible covalent adhesion of silica and gold nanoparticles to fabricate Nano and micro structure.
- Using AFM, SEM and various types of spectroscopy like fluorescent, FTIR, UV and various lasers in regular basis.
- Analyzing and statistically validating data using Drug Design software, Microsoft Excel and Origin Lab software resulting in 3 publications and 3 congress presentations.

Instructor , 04/2015 to 12/2018

Rice University

- Instructing Chemistry, Nanomaterials, Transdermal Drug Delivery systems and Skin Care to more than 400 students in chemistry, biology and engineering; guiding students to understand the fundamentals of cosmetic science and chemistry and enabling them to do experiments and solve complicated problems.

Associate Scientist , 09/2011 to 01/2014

Apex Systems

- Formulation and characterization of Anticancer & Antibacterial polymeric nano drugs and analyzing drug release and loading using HPLC

and UV spectroscopy.

- This resulted in seven publications in peer reviewed journals.
- Preparation of Albumin particles and in-vivo analysis and in-vitro analysis.
- Performed active screening of the market for Nano drugs to stay aware of new sales opportunities.

Education

Ph.D : Bioengineering , 11/2019

University of California

Master of Science : Medical Nanotechnology , 2012

Tehran University of Medical Sciences (TUMS)

Bachelor of Science : Chemistry , 2004

Isfahan University of Technologies (IUT)

Work History

Scientist , 11/2019 to Current

Company Name "Newport Beach

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