

Dr. Riyadh Hamdan Alshammari

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Education:

- Doctor of Philosophy in Chemistry, 2020
Indiana University Bloomington, USA
- Master of Science in Chemistry, 2014
Clemson University, USA
- Bachelor of Science in Chemistry, second-class honor, 2009
King Saud University, Saudi Arabia

Academic Experience:

- Assistants Professor of Inorganic Chemistry, Department of Chemistry,
King Saud University, 2020
- PhD Scholar at Indiana University Bloomington, 2014
Thesis title: Surface Modification of Gold Nanorods for Photoactive Degradation of
Fibrin Biopolymer
- Lecturer at King Saud University, 2017
- Master Scholar at Clemson University 2012
Thesis title: Hydrothermal Synthesis of Organic-Linked Polyoxometalate
- Teaching Assistant at King Saud University 2009
Teaching General Chemistry laboratory

Honors, Awards and Fellowship:

- Saudi Arabian Culture Mission Award for Academic Excellence. 2014
- King Saud University Fellowship Award for Graduate Studies in USA. 2012
- The Outstanding Student Award, King Saud University 2009
- Travel Award to United Kingdom, King Saud University 2009
- Dean's Medal for Academic Excellence, King Saud University 2009

Publications, Posters, and Conferences:

1. Abeer Beagan, Khalid Alotaibi, Manal Almakhlafi, Waffa Grablie, Nouf Alajme, Manal Alenezi, Hajer Alwalah, Fatamah Alharbi, **Riyadh Alshammari** and Abdullah Alswieleh. Amine and Sulfonic Acid Functionalized Mesoporous Silica as an Effective Adsorbent for Removal of Methylene Blue from Contaminated Water. *J. King Saud Univ. Sci. Submitted. 2021*
2. **Riyadh H. Alshammari**, U. Chinna Rajesh, David Morgan and Jeffrey M. Zaleski. Au-Cu@PANI Alloy Core-shells for Aerobic Fibrin Degradation Under Visible Light Exposure, *ACS Appl. Bio Mater.* **2020**, 3, 11, 7631–7638
3. PINDU Inorganic Symposium at Purdue University West Lafayette, Poster **2019**
4. Materials Research Symposium, Indiana University Bloomington, Poster **2019**
5. The Preparing Future Faculty Conference, Indiana University Bloomington moderator, **2018**
6. PINDU Inorganic Symposium at Norte Dame University, South Bend, Poster **2018**
7. Materials Research Symposium, Indiana University Bloomington, Poster **2018**
8. The Preparing Future Faculty Conference Indiana University Bloomington, **2017**
9. PINDU Inorganic Symposium at Indiana University Bloomington, Poster **2017**
10. Qualifying Exam Presentation, Indiana University Bloomington, Talk, **2017**
11. PINDU Inorganic Symposium at Purdue University West Lafayette, Poster **2016**
12. The 253rd American Chemical Society National Meeting, Philadelphia, PA **2016**
13. Materials Research Symposium, Indiana University Bloomington, Poster **2015**
14. PINDU Inorganic Symposium at Norte Dame University, South Bend, Poster **2015**
15. PINDU Inorganic Symposium at Indiana University Bloomington, Poster **2014**
16. The 21st ACS Fluorine Chemistry Conference in St. Petersburg, Florida **2013**
17. Saudi Chemical Society National Conference Makkah, Saudi Arabia **2008**
18. The Annual Meeting of Saudi Chemical Society, Riyadh, Saudi Arabia **2008**

Research skills:

- *Focused research training:*
Nano material synthesis and functionalization, Biopolymer synthesis, Protein assay, Light photolysis
- *Electron microscopy*
TEM (JEOL 1010 & 1400 HRTEM 2300), SEM (FEI Quanta 600), EDX elemental mapping

- *Material characterization techniques:*
Zetasizer, XRD, Sing crystal, XPS, HPLC, Thermogravimetric Analysis (TGA)
Gel electrophoresis, Column chromatography
- *Software:*
Image J, Origin, Chem Draw, Endnote, Crystal Clear, Shellex, Spartan, Hess
- *Spectroscopic techniques:*
UV-vis spectroscopy, MALDI mass, NMR, Fluorescence spectroscopy, IR, Raman
- *Synthetic techniques:*
Hydrothermal synthesis, Wet chemistry synthesis, Schlenk line, Glove box.
- *Biological sample techniques:*
Peptide quantification, 96-well assay analysis, Critical point drying, Spatter coating

Professional Memberships and Organization:

- Member of International Students Leadership Council, Office of international services, IUB 2018/2019
- Academic leadership program, Washington DC- Ministry of Education 2018
- Member of the American Chemical Society 2016
- Member of the Saudi Chemical Society 2008
- Student Advisory Council. King Saud University 2008
- Director of Scientific Reading Club, King Saud University 2007

Volunteering and Community Services:

- President, Saudi Students Club at Indiana University Bloomington 2019
- Coordinator, International Student Orientation, Office of international services, Indiana University Bloomington 2018
- Higher Education in Saudi Arabia, Near eastern languages and cultures program, talk. Indiana University Bloomington 2018
- Chemistry tutor in Bloomington 2017
- Bloomington Interfaith friendship program, 2017
- Culture bridge program, Templeton Elementary, Bloomington 2016
- Chair, academic committee, Saudi Students Club at Indiana University Bloomington 2016
- Treasurer, Saudi Students Club at Indiana University Bloomington 2015