

Speciality: Inorganic Chemistry

Academic Status: Professor

PhD: 1993 Berlin/Germany

MS: 1988 Berlin/Germany

BS/BA: 1984 Berlin/Germany

Address: Tehran-Jalale ale ahmad and Dr. chamran tarbiat modares university,institute of basic science

Department of chemistry

Phone: 00982182883442

Fax: 0098288009730

Email: mahjouba@modares.ac.ir

Courses:

1- Crystallography

2- Kinetics & Mechanism of Reactions

Courses:

1-Crystallography

2- Kinetic, thermodynamic & mechanism of inorganic reactions

3-Spectroscopy in inorganic chemistry

4- Advanced inorganic chemistry

5- Novel discussion in inorganic chemistry

6- Nano Chemistry

papers:

1. A. R. Mahjoub, A. Morsali, Crystal structure of meso nitrato-O,O -phenanthroline)isothiocyanatolead(II), C₂₅H₁₆N₆O₃PbS, Z. Kristallogr. NCS, 216 (2001) 601.
2. A. Morsali, A. Tadjarodi, R. Mohammadi, A. R. Mahjoub, Crystal structure of bis(4,4'-bithiazole)bismuth(III) trinitrate hemihydrate, Bi(C₆H₄N₂S₂)₂(NO₃)₃ ·0.5H₂O, Z. Kristallogr. NCS, 216 (2001) 379.
3. A. R. Mahjoub, A. Morsali, A Dimeric Mixed-Anions Lead(II) Complex: Syntheses and Structural Characterization of [Pb₂(BTZ)₄(NO₃)](ClO₄)₃, {BTZ=4,4'-Bithiazole}, Chemistry Letters, (2001) 1234.
4. A. R. Mahjoub, A. Morsali, Syntheses and characterization of lead(II) salts with 4,4'-bithiazole ligand: X-ray crystal structure of [(BTZ)₂Pb(NO₃)₂] and [(BTZ)Pb(SCN)₂]_n (a new polymeric compound), Polyhedron, 21 (2002) 197.
5. A. R. Mahjoub, A. Morsali, M. R. Poorheravi and E. Shams, Crystal structure of 4,4', 5,5'- tetraphenyle-2,2'-bithiazole, C₃₀H₂₀N₂S₂, Z. Kristallogr. NCS 217 (2002) 79
- .
6. A. Ramazani, N. Noshiranzadeh, S. Kaffashy, A. Morsali, A. Jamali, F. Gouranlou, Crystal structure of dimethyl 3H-naphtho[2,1,b]pyran-2,3-dicarboxylate, C₁₇H₁₄O₅, Z. Kristallogr. NCS 217 (2002) 231
7. A. R. Mahjoub, A. Morsali, DIRECT SYNTHESIS OF A DIMERIC MIXED-ANIONS LEAD(II) COMPLEX, CRYSTAL STRUCTURE OF [Pb(PHEN)(2OCCH₃)(NCS)]₂, Polyhedron, 21 (2002) 1223.
8. A. R. Mahjoub, A. Morsali, Refinement of the crystal structure of bis(1,10-phenanthroline)bismuth(III)trinitrate C₂₄H₁₆BiN₇O₉, at 110K, Z. Kristallogr. NCS NCS 217 (2002) 443.
9. A. R. Mahjoub, A. Morsali, Refinement of the crystal structure of trans-bis(1,10-phenanthroline)bismuth(III) tribromide, C₂₄H₁₆BiBr₃N₄, Z. Kristallogr. NCS 217 (2002) 513.
10. A. R. Mahjoub, A. Morsali, H. Bagherzadeh, Syntheses and characterization of thallium (I) complexes with 3-nitrophenoxyde [Tl (3-np)], 4-nitrobenzoate [Tl(4-nb)] and 2,4-dinitrophenoxyde [Tl(2,4-dnp)]: X-ray crystal structures of [Tl(3-np)]_n and Tl(2,4-dnp) (two new polymeric compounds), Polyhedron, 21 (2002) 2555.
11. A. Morsali, A. R. Mahjoub, Direct Synthesis A Dimeric Mixed-Anions Bismuth(III) Complex: Synthesis and Structural Characterization of [Bi₂(phen)₄(NO₃)₄.4I_{0.6}]I₃, J. Coord. Chem., 56 (2003) 571-577.
12. A. Morsali, A. R. Mahjoub, Hg(II), Tl(III), Cu(I), and Pd(II) Complexes With 2, 2'-diphenyl-4, 4'-bithiazole (DPBTZ), Syntheses and X-ray Crystal structure of [Hg(DPBTZ)(SCN)₂], J. Coord. Chem., 56 (2003) 779-785.
13. A. R. Mahjoub, A. Morsali, Crystal structure of 2,2'-diphenyl-4,4'-bithiazole,C₁₈H₁₂N₂S₂, Z. Kristallogr, . NCS 218 (2003) 121.
14. A. Morsali, A. R. Mahjoub and H. R. Bijanzadeh, Crystal structure of Nitrato-O,O'-bis(1,10-phenanthroline)nitritolead(II), Pb(phen)₂(NO₃)_{1.5}(NO₂)_{0.5}, Z. Kristallogr, . NCS 218 (2003) 189.
15. A. Morsali, Ali Ramazani and Ali Reza Mahjoub, Ni(II), Pd(II), Cu(II), and Zn(II) Complexes With N-(2-pyridyl)carbonylaniline (L), Syntheses and X-ray Crystal structures of [Cu(L)₂(H₂O)₂](ClO₄)₂, [Cu(L)₂(H₂O)₂](NO₃)₂ and [Zn(L)₂(H₂O)₂](ClO₄)₂, J. Coord. Chem., 56 (2003) 1555-1566.

16. Ali Morsali, Ali Reza Mahjoub and Ali Ramazani, Zn(II), Cd(II) and Hg(II) Complexes with 2,2'-biquinoline, Syntheses and X-ray Crystal Structures of [Hg(bq)(SCN)2], *J. Coord. Chem.*, 57 (2004) 347-352.
17. A. Morsali, A. R. Mahjoub, A. Ramazani, Crystal structure of the [Hg(DmlmH)(NCS)2] (DmlmH= 2,2'-bis(4,5-dimethylimidazole), C12 H14 Hg N6 S2, *Z. Kristallogr.*, NCS 218 (2003) 435-436.
18. Ali Morsali, Ali R. Mahjoub, Mohammad J. Soltanian and Simin Janitabar Darzi, Syntheses and Characterization of 1:2 Adduct Mixed-Anions Lead (II) Complexes, [Pb(phen)2(CH₃COO)]X (X=NCS-, NO₃- and ClO₄-), Crystal Structure of [Pb(phen)2(CH₃COO)](ClO₄), *Z. Anorg. Allg. Chem.* 629 (2003) 2596-2599..
19. A. Morsali, Ali R. Mahjoub, A. Ramazani, and A. A. Soudi, Syntheses and Characterization of Zn(II), Cd(II) and Hg(II) Complexes with N-(2-pyridyl)carbonylaniline (L), X-ray Crystal Structures of [Hg(L)(SCN)2], *Z. Anorg. Allg. Chem.* 629 (2003) 2058-2061..
20. A. Morsali, A.R Mahjoub, Direct Synthesis of the Novel 2-D Mixed-ligands Lead (II) Complex, Crystal Structure of [Pb(4,4'-bpy)(NO₃)(SCN)]_n (a New Polymeric Compound with three bridged ligand and Inactive Lone Pair), *Chem. Let.* 33 (2004) 64-65.
21. A. Morsali, A. R. Mahjoub and A. Hossienian, Syntheses and Characterization of lead(II) complexes, Pb(dmphen)X₂ (X=NO₃-, ClO₄- and CH₃COO-), Crystal Structure of [Pb(dmphen)(NO₃)₂]_n (a New Polymeric Compound), *J. Coord. Chem.*, 57 (2004) 685-692.
- 22.A. Morsali, A. R. Mahjoub, Coordination polymers of Lead(II) with 4,4'-bipyridine:Syntheses and Structures, *Polyhedron*, 23 (2004) 2427-2436.
- 23.A. R. Mahjoob, A. Morsali, R. Ebrahim Nejad, Syntheses and Characterization of New Mixed-Ligand Mercury(II) Complexes, Hg(bpy)_n(SCN)X (X= CH₃COO-, NO₃- and ClO₄-), Crystal Structure of [Hg(bpy)₂(SCN)]NO₃, *Z Naturforsch*, 59b (2004) 1109-1113.
- 24.A.Morsali, A. R. Mahjoub, Holo and Hemidirected in A New Novel three-dimensional Polymeric Potassium(I)Lead(II) Hetropolynuclear Complex, Crystal and Molecular Structure of [K_nPb(CH₃COO)₂(SCN)]_n, *Helvetica Chimica Acta*, 87 (2004) 2722-2717.
- 25.A. Morsali, A. R. Mahjoub, The First Hemidirected Nine Coordinate Lead(II) Complex, Crystal and molecular Structure of [Pb(BzImH)2py (H₂O)₂(NO₃)₂].(BzImH)2py.H₂O, (BzImH)2py= 2,6-Bis(2-benzimidazolyl)pyridine, *Inorg. Chem. Communi.* 7 (2004) 915-918..
26. A. Morsali, A. R. Mahjoub, M. J. Soltanian, P. E. Pour, Syntheses and Characterization of Mixed-Ligands Lead(II) Complexes, [Pb(bpy)(CH₃COO)X] (X= I-, NO₃-, and ClO₄-), Crystal Structure of [Pb(bpy)(NO₃)(CH₃COO)]_n (A New 1-D Polymeric Compound), *Z. Naturforsch*, 60b (2005) 300-304.
- 27.A. R. Mahjoub, A. Morsali, S. Nouryan Aval, Crystal structure of pyridil-2-methylammonium nitrate, (C₆H₉N₂)NO₃, *Z. Krystallogr. NCS*, 220 (2005) 45-46.

- 28.A. R. Mahjoub, A. Morsali, Z. Talaei, A. Hosseinian, Crystal structure of $[Zn(\text{phen})_2\text{Cl}](\text{ClO}_4)\cdot\text{H}_2\text{O}$, phen=1,10-phenanthroline, 'C₂₄ H₁₆ Cl N₄ Zn +1, Cl O₄ -1, H₂ O Z. Krystallogr. NCS, 220 (2005) 47-48.
29. M. R. Fadaei, A. Morsali, and Ali R. Mahjoub, Synthesis and Structural Characterization of a New Two-Dimensional Polymeric Thallium(I) Complex, $[\text{Tl}_2(\text{phthalate})]_n$, Z. Naturforsch, 60b (2005) 741-744.
30. Zeanab Talaei, Ali Morsali, and Ali R. Mahjoub, $[\text{Zn}(\text{phen})_2(\text{CX}_3\text{COO})]_n$ X=H or Cl; Influence of X on the Coordination Mode of the Carboxylate group (phen = 1,10-phenanthroline), Z. Naturforsch, 60b (2005) 1049-1053.
31. Ali Morsali, Ali R. Mahjoub, Structural influence of counter-ions in lead(II) complexes: $[\text{Pb}(\text{phen})_n(\text{NO}_2)_X]$, X = CH₃COO-, NCS- and ClO₄-, phen = 1,10-phenanthroline, Solid State Sciences 7 (2005) 1429-1437.
32. A. Hosseinian, A. R. Mahjoub, Ali Morsali Crystal Structure of 2, 2'-diamino-5,5'-dimethyl-4,4'-bithiazolium dibromide monohydrate, $[(\text{C}_6\text{H}_6\text{N}_2\text{S})_2\text{Br}_2\cdots\text{H}_2\text{O}]$, Z. Kristallogr, . NCS 220 (2006) 439.
33. Z. Talaei, A. Morsali, A. R. MahjoubNew mixed-anion zinc(II) complexes, $[\text{Zn}(\text{phen})_2(\text{CCl}_3\text{COO})(\text{H}_2\text{O})]_n(\text{NO}_3)$ and $[\text{Zn}(\text{bpy})_2(\text{CH}_3\text{COO})]_n(\text{ClO}_4)\cdot\text{H}_2\text{O}$; synthesis, characterization and crystal structure, J. Coord. Chem. 59 (2006) 643 ..
34. M. Ghoreishi Amiri and A. Morsali, Thermal and Structural Studies of A 1D ZnII Coordination polymer, $[\text{Zn}(\mu-4,4'\text{-bipy})(\text{H}_2\text{O})_4]_n(\text{CCl}_3\text{COO})_2\text{n}\cdot(4,4'\text{-bipy})_2\text{n}$ ($4,4'\text{-bipy} = 4,4'\text{- bipyridine}$), New Shorted Cl•••Cl Interactions, Z. Anorg Allg Chem , 632(2006) 1419.
35. ALI MORSALI, ZOHREH RASHIDI RANJBAR, MARYAM GHOREISHI AMIRI, AZADEH ASKARINEJAD, AND HONG-PING XIAO, Syntheses and structural characterization of new cadmium(II) complex of imidazole (HIm) ligand, $[\text{Cd}(\text{Im})_6](\text{ClO}_4)_2$, J. Coord. Chem. 59 (2006) 961.
36. Ali Morsali, Ali R. Mahjoub, Synthesis and crystal structure of a mixed-ligand bismuth(III) complex, $[\text{Bi}_2(\text{phen})_2\text{Br}_5(\text{NO}_3)]_n$ (phen = 1,10-phenanthroline), J. Coord. Chem. 59 (2006) 1427..
37. A. Askarinejad, M. R. Fadaei, A. Morsali, A. Mahjoub, Syntheses and structural characterization of New TlI and KI complexes of 3,5-dinitrobenzoic acid (HDNB), $[\text{Tl}(\text{I}-\text{DNB})]_n$ and $[\text{K}(\text{I}-\text{DNB})(\text{I}-\text{HDNB})]_n$ J. Coord. Chem. 60, 2007, 753
38. M.Pourayoubi and A.R. Mahjoub, A Novel Hybrid Material Based on Two Symmrtrically Independent Kggin Polyoxoanions: $[\text{NH}_3\text{-CH}(\text{CH}_3)\text{COOH}][\text{H}_3\text{O}]_8\{\text{PMo}_{12}\text{O}_{40}\}_3\cdot 4\text{NH}_3\text{CH}(\text{CH}_3)\text{COO}$, J.Iran.Chem.Soc., 5, 3.3, 2008,430-435.
- 39.Preparation of SnO₂ nanoparticles and nanorods by using a hydrothermal method at low temperatureAzam Anaraki Firooz, Ali Reza Mahjoub, Abbas Ali Khodadadi.Materials Letters, Volume 62, Issues 12-13, 30 April 2008, Pages 1789-1792
- 40.Azam Anaraki Firooz, Ali Reza Mahjoub, Abbas Ali Khodadadi39.Effects of flower-like, sheet-like and granular SnO₂ nanostructures prepared by solid-state reactions on CO sensing,Materials Chemistry and Physics, Volume 115, Issue 1, 15 May 2009, Pages 196-199.
41. M.afsharpour, A.R. Mahjoub, M.M.Amini, A Nanohybrid of Molybdenum Oxide, J Inorg. Organomet., Polym, 2008, 18, 472-6.
42. I.yavari, A. R.Mahjoub, E.Kowsari,M. Movahedi, Synthesis of ZnO nanostructures with controlled morphology and

....,J. Nanopart Res , 2009, 11, 861-8.

Conferences:

1-The International Conference on Nanotechnology Science and Applications (Nanotech Insight '09, Barcelona , Spain,2009.

2-1th Internatinal conference from nanoparticle and nanomaterials to nanodevices and nanosystems,Greece, 2008.

3-The 2th Conference on Nanostructures(NS2008), Kish University, Kish Island, I.R. Iran.

4- International Catalysis Conference, ICC 2008.

5-Iran-India Joint Conference in Nano Technology, Tehran,2008.

6-10th Iranian Inorganic Chemistry Conference IICC, Sistan & Baluchestan university, 2008..

7- 9th Iranian Inorganic Chemistry conference , Smnan university, 2007

8-6th Sesame users meeting , Amman, Jordan, 2007

9-First Seminar of Medical & natural products chemistry, Shiraz, Iran, 2005.

10- First Internatinal congress on Nanoscience and nanotechnology, university of Tehran, Iran, 2006.

11- 3th Iranian Seminar of chemistry and Environment,Kordestan university, Iran, 2005.

12-Internationa Conference on chemistry and Industry, King Soud Univers, 2004.

Students:

1- S. Ghammami, Synthesis & charactrization of some complexes with coordination, 1996.

2- A.r. Abbasi, Reaction of tetramethyleammonium fluoride with some complexes of Tungsten, 2000

3-A. Hosseiniyan, Reaction of tetramethyleammonium fluoride with some complexes of Chromium, 2000

4- R.A. Mohammadi, Charge Distribution in Chlorine oxides & those cations,2001

5- A. Morsali,Synthesis & Structural charactrization some of Mercury(II) ,.....complexes ,2003.

6- S. Nourian Aval, Synthesis & charactrization of some New Bismuth (II) complexes with, 2004.

7-M. R. Fadaie, Synthesis & charactrization of some New Thallium (II) complexes with, 2005

8- Z. TaLaei, Synthesis & charactrization of some Cu(II), Zn(II)... complexes , 2005

9- E. Latifi, Synthesis & charactrization of some Transition Meta;ls (Cr, Mn, Fe) complexes with, 2005

10-M. Fathi , Study of different methods of Cobalt and Cadmium extraction ..., 2006.

11-M. Tahernejad, Synthesis & Application of Silica Nanomaterials as, 2007

12-F. Maleki Rizi, Synthesi , charactrization & structural determination of some New Polyoxometalate, 2008

Professional experiences:

1- coordination chemistry

2- nanotecnology

3- Fluorochemistry