Curriculum Vitae (CV)

Name: Mehdi Salehi
Date of birth: Apr. 30, 1973, Amol, Iran
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Education:

1) B. Sc. in Chemistry, Jun. 2000, Razi University, Kermanshah, Iran.
2) M. Sc. of Inorganic Chemistry, Sep.2004, Isfahan University of Technology, Isfahan, Iran.
3) Ph.D. of Inorganic chemistry, Isfahan University of Technology, Isfahan, Iran (2009)

Research Interests:

1-Synthesis and characterization of transition metal complexes with Schiff base ligands.
2-Solvatochromism, electrochemistry, and solid state reactions of cobalt(III) Schiff base complexes.
3-Biological activity, DFT calculations and molecular docking study of coordination compounds.
4- Synthesis and characterization of alumina nano-powder and nano oxides.

Experiences:

1-Software (Mercury, publCIF, WinGX, PLATON, SHELXTL, Expert, enCIF and ORTEP3)
2-Programs under Windows 10 and XP (Microsoft Word, Excel, Powerpoint)

Publications:

Synthesis, structure, computational modeling and biological activity of two new Casiopeínas® complexes and their nanoparticles

RE Malekshah, M Salehi, M Kubicki, A Khaleghian
Journal of Coordination Chemistry (2019) Inpress

Synthesis, crystal structure, electrochemical behavior and molecular docking of poly-nuclear metal complexes of Schiff base ligand derived from 2-amino benzyl alcohol

P Roozbahani, M Salehi, RE Malekshah, M Kubicki
Inorganica Chimica Acta (2019) Inpress.

The Structural study, Hirshfeld surface analysis and DFT calculations of ferrocenyl-hydrazine Schiff base: A novel precursor for selective preparation of Fe_2O_3 nanoparticles
S Parvarinezhad, M Salehi, S Kademinia, M Kubicki
Journal of Molecular Structure (2019) 1197, 96-107

New copper (II) and vanadium (IV) complexes based on allylamine-derived Schiff base ligand; synthesis, crystal structure, electrochemical properties and DFT calculations
A.B. Deilami, M. Salehi, A Amiri, A. Arab
Journal of Molecular Structure (2019) 1181, 190-196.

Synthesis, characterization and crystal structures of two novel sulfa drug Schiff base ligands derived sulfonamide and molecular docking study
M. Salehi, M. Kubicki, M. Galini, M. Jafari, R.E. Malekshah
Journal of Molecular Structure (2019) 1180, 595-602.

Synthesis and characterization of new spinel $Mn_{0.5}Cu_{0.5}Cr_2O_4$ and degradation of Malachite Green from wastewater in comparison with $CuCr_2O_4$
F Soleimani, M Salehi, A Gholizadeh
International Journal of Nano Dimension (2019) 10 (3), 260-271.

Biological studies and computational modeling of two new copper complexes derived from β-diketones and their nano-complexes
R.E. Malekshah, M. Salehi, M. Kubicki, A. Khaleghian
Journal of Coordination Chemistry (2019) 72(10), 1697-1714.

Comparison of visible light photocatalytic degradation of different pollutants by (Zn, Mg) xCu1-xBi2O4 nanoparticles
F. Soleimani, M. Salehi, A. Gholizadeh
Ceramics International (2019) 45 (7), 8926-8939.

Solid state synthesis of $MgAl_2O_4$ nanomaterials and solar light-induced photocatalytic removal of Malachite green
S. Parvarinezhad, M. Salehi, S. Khademinia
International Journal of Nano Dimension (2019) 10 (1), 89-104.

Synthesis and characterization of new cobalt(III) and nickel(II) complexes derived from acetylacetone and 2-aminoopyridine: A new precursor for preparation NiO nanoparticles
M. Salehi, M. Galini, M. Kubicki, A. Khaleghian

Russian Journal of Inorganic Chemistry (2019) 64 (1), 18-27.

Synthesis and characterization of $Ni_{0.5}Cu_{0.5}Cr_2O_4$ nanostructure for discoloration of Aniline Dye under visible light from wastewater
F. Soleimani, M. Salehi, A. Gholizadeh
(2019) IJCCE In press.

Synthesis, characterization, anticancer and antibacterial evaluation of Schiff base ligands derived from hydrazone and their transition metal complexes
R. Fekri, M. Salehi, A. Asadi, M. Kubicki
Inorganica Chimica Acta (2018) 484, 245-25.

In vitro cytotoxic activity of a novel Schiff base ligand derived from 2-hydroxy-1-naphthaldehyde and its mononuclear metal complexes
Z Abbasi, M Salehi, A Khaleghian, M Kubicki
Journal of Molecular Structure (2018)1173, 213-220.

Synthesis, crystal structure, electrochemical properties and DFT calculations of three new Zn(II), Ni(II) and Co(III) complexes based on 5-bromo-2-((allylimino)methyl)phenol ...
A.B. Deilami, M. Salehi, A. Arab, A. Amiri
Inorganica Chimica Acta (2018) 476 (1), 93-100.

Spectroscopic studies, structural characterization and electrochemical studies of two cobalt (III) complexes with tridentate hydrazone Schiff base ligands: Evaluation of ...
R. Fekri, M. Salehi, A. Asadi, M. Kubicki
Applied Organometallic Chemistry (2018) 32 (2), e4019.

New mononuclear copper(II) complexes from β -diketone and β -keto ester N -donor heterocyclic ligands: Structure, bioactivity and molecular simulation studies.
R. E. Malekshah, M. Salehi, M. Kubicki, A. Khaleghian
Journal of Coordination Chemistry (2018) 71 (7), 952-968.

Co (III), V (IV) and Cu (II) complexes of bidentate N, O-donor Schiff base ligands: Characterization, anticancer activities and metal oxide nanoparticles preparation via solid ...
Z. Abbasi, M. Salehi, A. Khaleghian, M. Kubicki
Applied Organometallic Chemistry, (2018) 32 (11) 1-11.

New complexes of Ni (II) and Cu (II) with tridentate ONO Schiff base ligand: synthesis, crystal structures, electrochemical and theoretical investigation
M. Salehi, F. Faghani, M. Kubicki, M. Bayat
Journal of the Iranian Chemical Society, (2018) 15 (10) 2229–2240.

Novel Method for the Synthesis of CuO Nanoparticles: Application of Synthesized CuO Nanoparticles for Fabrication of Bisphenol an Electrochemical Sensor
F. Ghasemi, M. Salehi
Anal. Bioanal. Electrochem. (2018) 10 (7) 930-942.

Structural, magnetic and electrical properties of pure and Dy-doped Fe2O3 nanostructures synthesized using chemical thermal decomposition technique
M. Jafari, M. Salehi, M. Behzad
Int. J. Nano Dimens (2018) 9 (2), 179-190.

Crystal Structures and Biological Studies Two Novel Zinc Complexes Derived from para-Vanillin and Acetylacetone. Two New Precursors for Preparation ZnO Nanoparticles
M Jafari, M Salehi, M Kubicki, A Khaleghian
Russian Journal of Coordination Chemistry (2018) 44 (1), 21-31.

Spectroscopic studies, structural characterization and electrochemical studies of two cobalt (III) complexes with tridentate hydrazone Schiff base ligands: Evaluation of antibacterial activities, DNA-binding, BSA interaction and molecular docking
R. Fekri, M. Salehi, A. Asadi, M. Kubicki
Applied Organometallic Chemistry (2017) Doi:10.1002/aoc.4019.

Crystal structure, molecular docking, and biological activity of the zinc complexes with 2-thenoyltrifluoroacetone and N-donor heterocyclic ligands
R. E. Malekshah, M. Salehi, M. Kubicki, A.Khaleghian
Journal of Molecular Structure, (2017)1150 (15), 155–165.

Crystal structures, electrochemical properties, antioxidant screening and in vitro cytotoxic studies on four novel Cu (II) complexes of bidentate Schiff base ligands derived from 2-methoxyethylamine
Z. Abbasi, M. Salehi, M. Kubicki, A. Khaleghian
Journal of Coordination Chemistry, (2017)1-20.

Novel Synthesis of Manganese Spinel Nanoparticles via Combustion with $Mn^{III}(acac)_3$ as Precursor
M. Salehi, F. Ghasemi
International Journal of Nanoscience and Nanotechnology, (2017) 13 (2), 151-158.

Structural characterization and electrochemical studies of Co(II), Zn(II), Ni(II) and Cu(II) Schiff base complexes derived from 2-((E)-(2-methoxyphenylimino) methyl)-4-bromophenol; Evaluation of antioxidant and antibacterial properties
M. Galini, M. Salehi, M Kubicki, A. Amiri, A. Khaleghian
Inorganica Chimica Acta, (2017)461, 167-173.

DFT studies and antioxidant activity of Schiff base metal complexes of 2-aminopyridine. Crystal structures of cobalt(II) and zinc(II) complexes
M. Jafari, M. Salehi, M. Kubicki, A. Arab, A. Khaleghian
Inorganica Chimica Acta, (2017) 462, 329-335.

DNA/BSA interaction, bio-activity, molecular docking simulation study and electrochemical properties of hydrazone Schiff base derived Cu(II)/Ni (II) metal complexes: Influence of the nuclearity and metal ions
R. Fekri, M. Salehi, A. Asadi, M. Kubicki
Polyhedron, (2017) 128, 175–187.

Application of novel Ni(II) complex and ZrO_2 nanoparticle as mediators for electrocatalytic determination of N-acetylcysteine in drug samples
H. Karimi-Maleh, M. Salehi, F. Faghani
Journal of Food and Drug Analysis, (2017) 25, 1000-1007.

New Ni(II) complexes involving symmetrical bidentate N,O-donor Schiff base ligands: Synthesis at ambient temperature, crystal structures, electrochemical study, antioxidant and cytotoxic activities
Z. Abbasi, M. Salehi, M. Kubicki, A. Khaleghian
Journal Journal of Coordination Chemistry, (2017) 1-27.

Highly efficient and recyclable phosphoric acid functionalized zirconia encapsulated-Fe_3O_4 nanoparticles: clean synthesis of 1, 4-dihydropyridine and 1-amidoalkyl-2-naphthol derivatives
S. Zolfagharinia, E. Kolvari, M. Salehi
Reaction Kinetics, Mechanisms and Catalysis, (2017) 121, 1-18.

Fe_3O_4–cysteamine hydrochloride magnetic nanoparticles: New, efficient and recoverable nanocatalyst for Knoevenagel condensation reaction
R. Maleki, E. Kolvari, M. Salehi, N. Koukabi
Applied Organometallic Chemistry, 2017.

Synthesis, characterization, structural study and antibacterial activity of the Schiff bases derived from sulfanilamides and related copper(II) complexes
M. Salehi, F. Ghasemi, M. Kubicki, A. Asadi, M. Behzad, M. H. Ghasemi,A. Gholizadeh
Inorganica Chimica Acta, (2016) 453, 238-246.

Catalyst-free synthesis of (7E)-7-benzylidene-3, 3a, 4, 5, 6, 7-hexahydro-2, 3-diphenyl-2H-indazole derivatives in PEG-400 as a green and reusable solvent
A. Amoozadeh, E. Tabrizian, M. Salehi, M. Kubicki, S. Rahmani, T. Shamsi,M.Bitaraf
Journal of Chemical Research, (2016) 40 (9), 535-539.

Structural, spectroscopic, electrochemical and antibacterial studies of some new nickel (II) Schiff base complexes
M. Salehi, F. Rahimifar, M. Kubicki, A. Asadi
Inorganica Chimica Acta, (2016) 443, 28-35.

Synthesis, characterization, and crystal structures of α, α´-bis (substituted-benzylidene) cycloalkanone derivatives by nano-TiO_2/HOAc
E. Tabrizian, A. Amoozadeh, S. Rahmani, M. Salehi, M. Kubicki
Research on Chemical Intermediates, (2016) 42 (2), 531-544.

Nano-Titania-Supported Sulfonic-Acid-Catalyzed Synthesis of 2-Arylbenzothiazole Derivatives Under Solvent Free Conditions
A. Amoozadeh, R. A. Azadeh, S. Rahmani, M. Salehi, M. Kubicki,G. Dutkiewicz
Phosphorus, Sulfur, and Silicon and the Related Elements, (2015)190 (11), 1874-1883.
Solution combustion synthesis using Schiff-base aluminum complex without fuel and optical property investigations of alumina nanoparticles
M. Salehi, E. Arabsarhangi
International Nano Letters, (2015) 5 (3), 141-146.

Synthesis, characterization, crystal structures, computational studies, and antibacterial activities of two new Schiff bases derived from isophthalaldehyde
M. Salehi, A. Amoozadeh, A. Salamatmanesh, M. Kubicki, G. Dutkiewicz, A. Khaleghian
Journal of Molecular Structure, (2015) 1091, 81-87.

Characterization, crystal structures, electrochemical and antibacterial studies of four new binuclear cobalt (III) complexes derived from o-aminobenzyl alcohol
M. Salehi, M. Hasanzadeh
Inorganica Chimica Acta, (2015) 426, 6-14.

Synthesis, characterization, and X-ray crystal structure of cobalt (III) complexes with a N_2O_2-donor Schiff base and ancillary ligands. Spectral, antibacterial activity, and electrochemical studies
M. Salehi, M. Amirnasr, S. Meghdadi, K. Mereiter, H. R. Bijanzadeh, A. Khaleghian
Polyhedron, (2014) 81, 90-97.

Synthesis, crystal structures, spectroscopic studies and antibacterial properties of a series of mononuclear cobalt (III) Schiff base complexes
M. Hasanzadeh, M. Salehi, M. Kubicki, S. M. Shahcheragh, G. Dutkiewicz, ...
Transition Metal Chemistry, (2014) 39 (6), 623-632.

Synthesis, crystal structures, electrochemically studies and antibacterial properties of three new mono-nuclear and one very rare bi-nuclear cobalt (III) Schiff base complexes
R. Taherlo, M. Salehi
Inorganica Chimica Acta, (2014) 418, 180-186.

Synthesis, characterization, spectrophotometric investigation, structural study, and antibacterial activities of a series of new zinc (II) complexes
A. Zamani, M. Salehi, S. M Sajjadi, M. Kubicki, G. Dutkiewicz, A. Khaleghian
Journal of Coordination Chemistry, (2014) 67 (10), 1782-1793.

Synthesis, crystal structures and antibacterial studies of oxidovanadium (IV) complexes of salen-type Schiff base ligands derived from meso-1, 2-diphenyl-1, 2-ethylenediamine
O. Taheri, M. Behzad, A. Ghaffari, M. Kubicki, G. Dutkiewicz, A. Bezaatpour, H. Nazari, A. Khaleghian, A. Mohammadi, M. Salehi.
Transition Metal Chemistry, (2014) 39 (2), 253-259.

Synthesis and characterization of sub-micron alumina by combustion of aluminum complexes with acetylacetone and salicylaldehyde
Z. Khoshkhan, M. Salehi
Journal of Applied Chemistry, (2014) 8 (29), 31-34.

Synthesis, characterization, electrochemical studies, and antibacterial activities of cobalt (III) complexes with Salpn-Tipe Schiff base ligands. Crystal structure of trans-$[Co^{III}(L_1)(Py)_2]ClO_4$
M. Salehi, M. Kubicki, G. Dutkiewicz, A. Rezaei, M. Behzad, S. Etminani
Russian Journal of Coordination Chemistry, (2013)39 (10), 716-722.

Synthesis, Characterization, and Crystal Structure of α-Glucosimino-pyranose Anthranilic Acid
G. Dutkiewicz, M. Salehi, A. Amoozadeh, M. Ghasemi, A. Rezaei, M. Kubicki
Journal of Chemical Crystallography, (2013) 43 (2), 59-64.
Synthesis and characterization of nanostructured polythiophene in aqueous medium by soft-template method

M. Nasrollahzadeh, M. Jahanshahi, M. Salehi, M. Behzad, ...
Journal of Applied Chemistry, (2013) 8 (27), 31-34.

Syntheses, crystal structures, and antibacterial activities of two cobalt(III) complexes
M. Salehi, R. Kia, A. Khaleghian
Journal of Coordination Chemistry, (2012) 65 (17), 3007-3018.

Synthesis, characterization and spectral investigation of salen-type cobalt (iii) schiff base complexes. X-ray crystal structure of trans-[Co(Me-Salen)(3-Acetylpyridine)$_2$]ClO$_4$
M. Salehi, K. Mereiter, M. Amirnasr
Russian Journal of Coordination Chemistry, (2012) 38 (8), 573-578.

Synthesis, antibacterial studies and crystal structures of tridentate schiff base ligand and it's cobalt (III) complex
M. Salehi, G. Dutkiewicz, A. Rezaei, A. Amoozadeh, S. Rahmani, G. H. Grivani, M. Kubicki
Journal of Chemical Crystallography, (2012) 42 (8), 871-878.

Synthesis, characterization and the structural study of trinuclear complexcobalt of Schiff base ligand
M. Salehi
Journal of Applied Chemistry, (2012) 7 (22), 69-76.

Crystal structure, electrochemistry, and catalytic studies of a series of new oxidovanadium (IV) Schiff-base complexes derived from 1, 2-diphenyl-1, 2-ethylenediamine
A. Ghaffari, M. Behzad, G. Dutkiewicz, M. Kubicki, M. Salehi
Journal of Coordination Chemistry, (2012) 65 (5), 840-855.

Novel Synthesis and Crystal Structures of Two α, α'-bis-Substituted Benzylidene Cyclohexanones: 2, 6-Bis-2-nitro (benzylidene) cyclohexanone and 2, 6-Bis-4-methyl (benzylidene) cyclohexanone
A. Amoozadeh, S. Rahmani, G. Dutkiewicz, M. Salehi, F. Nemati, M. Kubicki
Journal of Chemical Crystallography, (2011) 41 (9), 1305.

Oxidovanadium complexes with tetradentate Schiff bases: synthesis, structural, electrochemical and catalytic studies.
J. Rahchamani, M. Behzad, A. Bezaatpour, V. Jahed, G. Dutkiewicz, M. Kubicki, M. Salehi.
Polyhedron, (2011) 30, 2611–2618.
Novel synthesis and crystal structures of two α, α′-bis-substituted benzylidene cyclohexanones: 2,6- is-2-nitro(benzylidene)cyclohexanone and 2,6-bis-4-methyl(benzylidene)cyclohexanone.
A. Amoozadeh, S. Rahmani, G. Dutkiewicz, M. Salehi, F. Nemati, M. Kubicki.
Journal of Chemical Crystallography, (2011), 41, 1305-1309.

{2,20-[1,10-(Ethane-1,2-diyldinitrilo)diethylidyne]diphenolato}bis (pyrrolidine)cobalt(III) perchlorate p-xylene hemisolvate.
M. Salehi, G. Dutkiewicz, M. Kubicki
Acta Cryst., (2010) E66, m1590.

Synthesis, characterization, solvatochromic behavior and crystal structures of the complexes $[Co^{III}(salophen)(thioacetamide)_2]ClO_4$ and $[Co^{III}(salophen)(thiobenzamide)_2]ClO_4$.
M. Salehi **,** M. Amirnasr , K. Mereiter,
J. Iran. Chem. Soc., (2010), 7740.

{2,2'-[O-Phenylenebis(nitrilomethylidyne)]diphenolato}dipyridinecobalt(III) Perchlorate.
M. Salehi, S. Meghdadi, M. Amirnasr, K. Mereiter
Acta Cryst., 2009, E65, m942.

Synthesis, Characterization, and Single Crystal X-ray Structures of $Co^{III}((BA)_2en)(thiobenzamide)_2]PF_6$ and $[Co^{III}(acacen)(thiobenzamide)_2]ClO_4$ and their solvatochromic properties.
M.Salehi **,** M. Amirnasr, K. Mereiter
Transition Metal Chemistry, 2009, 34, 373.

[1,1'-Diphenyl-3,3'-(propane-1,3-diyldinitrilo) dibut-1-nolato]copper(II).
M. Salehi, S. Meghdadi, M. Amirnasr, Kurt Mereiter
Acta Cryst., 2009, E65, m19.

The synthesis of $Co^{(III)}$ complexes of Me-salpn and Me-salbn as N_2O_2 donors and the ring size effect on the coordination mode and electrochemical properties. The crystal structures of *trans*-$[Co^{III}(Me\text{-}salpn)(Pyridine)_2]PF_6$ and *cis*-*α*-$[Co^{III}(Me\text{-}salbn)(4\text{-}Me\ pyridine)_2]BPh_4$.
K. J. Schenk , S. Meghdadi , M. Amirnasr , M. H. Habibi , A. Amiri , M.Salehi, A. Kashi
Polyhedron 2007, 26, 5448.

Synthesis, characterization, and single crystal X-ray structures of $[Co^{III}(acacen)(thioacetamide)_2]ClO_4$ and $[Co^{III}((BA)_2en)(thioacetamide)_2]PF_6$
Solvatochromic properties of $[Co^{III}(acacen)(thioacetamide)_2]ClO_4$.
M. Amirnasr, V. Langer, Nahid Rasouli, M. Salehi, S. Meghdadi
Can. J. Chem. 83 2005, 83, 2073.

Presentations:

1) Crystal X–ray Structures of Bis(thioacetamide)$_2$ (*N*,*N*´–disalicylidene–1,2–phenylendiamine)cobalt(III) perchlorate, *trans*–[Co^{III}(salophen)(thioacetamide)$_2$]ClO_4. $CHCl_3$
Mehdi Amirnasr , Kurt Mereiter , Mehdi Salehi
10th Iranian Seminar of Inorganic Chemistry, Zahedan, Iran May. 14-15, 2008.
2) Synthesis, Characterization, and Single Crystal X–ray Structures of Co^{III}((BA)$_2$en)(thiobenzamide)$_2$]PF_6 and [Co^{III}(acacen)(thiobenzamide)$_2$]ClO_4 and their solvatochromic properties
11th Iranian Seminar of Inorganic Chemistry, Isfahan, Isfahan University of Technology, Iran 2009.

Course taught:
1) General Chemistry Lab (I)(Isfahan University of Technology)
2) Inorganic Chemistry lab. (I), (II).(Isfahan University of Technology)
3) General Chemistry (Semnan University)
4) Inorganic Chemistry 1 and 2 (Semnan University)
5) Advance Inorganic Chemistry (Semnan University)
6) X-ray Crystallography
7) Kinetics and mechanisms of inorganic reactions