

Christopher B. Durr Ph.D

Full Publication List

Note: All work with Prof. M.H. Chisholm was published with authors in alphabetical order.

h-Index: 11 Number of Citing Articles: 174 Number of Times Cited: 317

33. "An Investigation into the coordination chemistry of o-vanillin derived bis(phenoxy-imine)Ti(IV) Complexes and its effects on lactone ring-opening polymerization activity " Christopher B. Durr, Charlotte K. Williams. *In Preparation*, **2018**.
32. "Indium Catalysts for Low Pressure CO₂/Epoxide Ring Opening Copolymerization: Evidence for A Mononuclear Mechanism?" Arnaud Thevenon, Anish Cyriac, Dominic Myers, Andrew J. P. White, Christopher B. Durr, Charlotte K. Williams. *Journal of the American Chemical Society*, *140* (22) **2018** 6893 – 6903.
31. "TMPMgBu(L), where L = THF, 2-MeTHF, pyridine and dimethylaminopyridine and TMP = 1,5,9-trimesityldipyrromethene: Reaction with lactide and ε-caprolactone" Vagulejan Balasanthiran, Malcolm H. Chisholm, Kittisak Choojun, Christopher B. Durr, Stanley Jing, and Pasco M. Wambua, *Journal of Organometallic Chemistry*, *841*, **2017**, 74 - 81.
30. "Synthesis, Structure, and Photophysical Properties of Mo₂(NN)₄ and Mo₂(NN)₂(TPB)₂ where NN = N, N'- Diphenyl-phenylpropiolamidinate and TPB = 2, 4, 6 – Triisopropylbenzoate" Changcheng Jiang, Philip J. Young, Christopher B. Durr, Thomas F. Spilker, and Malcolm H. Chisholm, *Inorganic Chemistry*, *55* (12) **2016**, 5836 – 5844.
29. "Dimeric FeFe-Hydrogenase Mimics Bearing Carboxylic Acids: Synthesis and Electrochemical Investigation" Benjamin R. Garrett, Amneh Awad, Mingfu He, Kevin A. Click, Christopher B. Durr, Judith C. Gallucci, Christopher M. Hadad, and Yiyang Wu, *Polyhedron*, *103*, **2016**, 21 – 27.
28. "(TMP)ZnN(SiMe₃)₂, [(TMP)Zn(μ-OⁱPr)]₂ and (TMP)Zn[OCMe₂C(O)OEt]. Their role in the Ring-Opening of rac-lactide and caprolactone where TMP = 1,5,9 - trimesityldipyrrolemethene" Vagulejan Balasanthiran, Malcolm H. Chisholm, Kittisak Choojun, Christopher B. Durr, and Pasco M. Wambua, *Journal of Organometallic Chemistry*, *812*, **2016**, 56 – 65.
27. "[MoO(S₂)₂L]¹⁻ (L = picolinate or pyrimidine-2-carboxylate) Complexes as MoS_x Inspired Electrocatalysts for Hydrogen Production in Aqueous Solution" Benjamin R. Garrett, Kevin A. Click, Christopher B. Durr, Christopher M. Hadad, and Yiyang Wu*, *Journal of the American Chemical Society*, *138*, **2016**, 13726 – 13731.
26. "BDI*MgX(L) where X = ⁿBu and O^tBu and L = THF, py, and DMAP. The Rates of Kinetic Exchange of L where BDI* = CH₂{C(^tBu)N-2,6-(ⁱPr)₂C₆H₃}₂" Vagulejan Balasanthiran, Malcolm H. Chisholm, and Christopher B. Durr, *Polyhedron*, *103*, **2016**, 235 - 240.

25. "Bismuth – Lithium Bonding in the Ion Pairs: LiBiL₂ where L = a Porphyrin or Salen Ligand" Vagulejan Balasanthiran, Malcolm H. Chisholm, and Christopher B. Durr, *Dalton Transactions*, 44, **2015**, 8205 – 8213.
24. "Electronic and Spectroscopic Properties of Avobenzene Derivatives Attached to Mo₂ Quadruple Bonds" Malcolm H. Chisholm, Christopher B. Durr, Terry L. Gustafson, William T. Kender, Thomas F. Spilker and Philip J. Young, *Journal of the American Chemical Society*, 137, **2015**, 5155 – 5162.
23. "Steric and Electronic Factors Associated with the Photoinduced Ligand Exchange of Bidentate Ligands Coordinated to Ru(II)" Bryan A. Albani, Tyler Whittemore, Christopher B. Durr, and Claudia Turro, *Photochemistry and Photobiology*, 91, **2015**, 616 – 623.
22. "MM Complexes Supported by Vinylbenzoate Ligands: Synthesis, Characterization, Photophysical Properties and Application as a Synthone" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Thomas F. Spilker and Philip J. Young, *Chemical Science*, 4, **2015**, 1780 – 1791.
21. "Molecular Ordering by Halide-Halide Interactions in Dimolybdenum p-halobenzoates" Malcolm H. Chisholm, Christopher B. Durr and Thomas F. Spilker, *Inorganica Chimica Acta*, 424, **2015**, 300 – 307.
20. "Isomerization Initiated by Photoinduced Ligand Dissociation in Ru(II) Complexes with the Ligand 2-*p*-tolylpyridinecarboxaldimine" Bryan A. Albani, Christopher B. Durr, Bruno Peña, Kim R. Dunbar, Claudia Turro, *Dalton Transactions*, 43, **2014**, 17828 – 17837.
19. "Unusually Efficient Pyridine Photodissociation from Ru(II) Complexes with Sterically Bulky Bidentate Ancillary Ligands" Jessica D. Knoll, Bryan A. Albani, Christopher B. Durr, and Claudia Turro, *Journal of Physical Chemistry - A*, 118, **2014**, 10603 – 10610.
18. "cis-Thienyl Carboxylates Bound to Mo₂ Quadruply Bonded Units and Titanium Dioxide" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Terry L. Gustafson, and Thomas F. Spilker, *Journal of the American Chemical Society*, 136, **2014**, 11428 – 11435.
17. "4-Nitrophenyl and 4'-nitro-1,1'-biphenylcarboxylates Attached to Mo₂ Quadruple Bonds: Ground Versus Excited State M₂δ – Ligand Conjugation" Brian G. Alberding, Malcolm H. Chisholm, Christopher B. Durr, Judith C. Gallucci, Yagnaseni Ghosh, and Thomas F. Spilker, *Dalton Transactions*, 43, **2014**, 11397-11403
16. "Molybdenum-Molybdenum Quadruple Bonds Supported by 9,10-Anthraquinone Carboxylate Ligands. Molecular and Electronic Structures and Ground State and Photoexcited State Redox Properties" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Sharlene A. Lewis, Thomas F. Spilker and Philip J. Young, *Chemical Science*, 4, **2014**, 2657 - 2666.
15. "On the Molecular Structure and Bonding in a Lithium Bismuth Porphyrin Complex: LiBi(TPP)₂" Vagulejan Balasanthiran, Malcolm H. Chisholm, and Christopher B. Durr, *Angewandte Chemie International Edition*, 53, **2014**, 1594-1597.

14. "Mo₂ Paddlewheel Complexes Functionalized with a Single MLCT, S₁ Infrared-Active Carboxylate Reporter Ligand: Preparation and Studies of Ground and Photoexcited States" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Sharlene A. Lewis, Thomas F. Spilker, and Philip J. Young. *Inorganic Chemistry*. 53, **2014**, 637-644.
- 13 "Ethyl 2-hydroxy-2-methylpropanoate derivatives of magnesium and zinc. The effect of chelation on the homo- and copolymerization of lactide and ε-caprolactone" Vagulejan Balasanthiran, Malcolm H. Chisholm, Kittisak Choojun and Christopher B. Durr. *Dalton Transactions*. 43, **2014**, 2781-2788.
12. "Concerning the ground state and S₁ and T₁ photoexcited states of the homoleptic quadruply bonded complexes Mo₂(O₂CC₆H₄-*p*-X)₄ where X = C≡C-H or C≡N." Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, and Thomas F. Spilker. *Journal of Physical Chemistry – A*. 117, **2013**, 13893-13898.
11. "Selective Photoinduced Ligand Exchange in a New Tris-Heteroleptic Ru(II) Complex" Bryan A. Albani, Christopher B. Durr, and Claudia Turro. *Journal of Physical Chemistry – A*. 117, **2013**, 13885-13892.
10. "Modulating the M₂δ-to-Ligand Charge Transfer Transition by the Use of Diarylboron Substituents" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, and Thomas F. Spilker and Philip J. Young, *Dalton Transactions*, 42, **2013**, 14491-14497.
9. "Single-site Bismuth Alkoxide Catalysts for the Ring-Opening Polymerization of Lactide and ε-Caprolactone" Vagulejan Balasanthiran, Malcolm H. Chisholm, and Christopher B. Durr, *Dalton Transactions*, 42, **2013**, 11234-11241.
8. "Molecular and Electronic Structure of MM Quadruply Bonded Complexes Containing O₂CC₆H₄N(Ph)₂ Supporting Ligands" Malcolm H. Chisholm, Christopher B. Durr, Sharlene L. Lewis, *Polyhedron*. 64, **2013**, 339-345.
7. "Metal-Metal Quadruple Bonds Supported by 5-Ethynylthiophene-2-carboxylato Ligands: Preparation, Molecular and Electronic Structures, Photoexcited State Dynamics, and Application as Molecular Synthons" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, and Thomas F. Spilker, *The Journal of the American Chemical Society*, 135 (22), **2013**, 8254-8259.
6. "Coordination of N,N-Chelated Re(CO)₃Cl units across a Mo₂ quadruple bond: Synthesis, characterization, and photophysical properties of a Re-Mo₂-Re triad and its component pieces" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Terry L. Gustafson and Thomas F. Spilker, *The Journal of Physical Chemistry A*, 117(29), **2013**, 5997-6006.
5. "MM Quadruple bonds supported by cyanoacrylate ligands. Extending photon harvesting into the near infrared and studies of the MLCT states" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Vesal Naseri and Thomas F. Spilker, *Chemical Science*, 4, **2013**, 2105-2116
4. "Electronic Structure and Excited-State Dynamics of the Molecular Triads: *trans*-M₂(TⁱPB)₂[O₂CC₆H₅-η⁶-Cr(CO)₃]₂, Where M = Mo or W, and TⁱPB = 2,4,6-triisopropylbenzoate" Samantha E. Brown-Xu, Malcolm H. Chisholm, Christopher B. Durr, Terry L. Gustafson, Vesal Naseri and Thomas F. Spilker, *Journal of the American Chemical Society*, 134 (51), **2012**, 20820-20826.

3. "Oxalate Bridged MM Quadruply Bonded Oligomers: Considerations of Electronic Structure and Synthetic Strategies" Malcolm H. Chisholm, Christopher B. Durr, Christopher M. Hadad, and Thomas F. Spilker. *Journal of Cluster Science*, 23, **2012**, 767-780.
2. "A Family of 1,1,3,3-Tetraalkylguanidine (H-TAG) Solvated Zinc Aryloxide Pre-Catalysts for the Ring-Opening Polymerization of *rac*-Lactide" Julia J. Ng, Christopher B. Durr, Jacob M. Lance and Scott D. Bunge. *European Journal of Inorganic Chemistry*, 9, **2009**, 1424-1430.
1. "1,1,3,3-Tetramethylguanidine solvated lanthanide aryloxides: Pre-catalysts for intramolecular hydroalkoxylation" Thomas E. Janini, Robert Rakosi III, Christopher B. Durr, Jeffery A. Burtke and Scott D. Bunge. *Dalton Transactions*, 47, **2009**, 10601-10608.

Patents

2. "Catalysts Suitable for the Ring-Opening Polymerisation of Cyclic Esters and Cyclic Amides" *UK Patent Application*, **2017**.
1. "Group IV Catalysts Featuring Schiff Base Ligands for Polymerisation of Olefins" *UK Patent Application*, **2017**.