# Carl H Schiesser

List of Publications by Year
in descending order



| 65 | 2,702 | 186265 28 | 182427 51 |
|---|---|---|---|
| papers | citations | h-index | g-index |

| 67 | 67 | 67 | 1565 |
|---|---|---|---|
| all docs | docs citations | times ranked | citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Regio- and stereo-selectivity of alkenyl radical ring closure: A theoretical study. Tetrahedron, 1985, 41, 3925-3941. | 1.9 | 686 |
| 2 | Free-radical homolytic substitution: New methods for formation of bonds to heteroatoms. Tetrahedron, 1996, 52, 13265-13314. | 1.9 | 147 |
| 3 | Radicals Masquerading as Electrophiles: Dual Orbital Effects in Nitrogen-Philic Acyl Radical Cyclization and Related Addition Reactions. Accounts of Chemical Research, 2007, 40, 303-313. | 15.6 | 136 |
| 4 | (Aryltelluro)formates as Precursors of Alkyl Radicals:Â Thermolysis and Photolysis of Primary and Secondary Alkyl (Aryltelluro)formates. Journal of Organic Chemistry, 1996, 61, 5754-5761. | 3.2 | 101 |
| 5 | Reactivity of disulfide bonds is markedly affected by structure and environment: implications for protein modification and stability. Scientific Reports, 2016, 6, 38572. | 3.3 | 101 |
| 6 | Free-radical homolytic substitution at selenium: an efficient method for the preparation of selenophenes. Journal of Organic Chemistry, 1993, 58, 5632-5638. | 3.2 | 78 |
| 7 | Intramolecular Homolytic Substitution with Amidyl Radicals:Â A Free-Radical Synthesis of Ebselen and Related Analogues. Journal of Organic Chemistry, 1997, 62, 3103-3108. | 3.2 | 68 |
| 8 | Tandem free-radical addition/substitution chemistry and its application to the preparation of novel AT<sub>1</sub>receptor antagonists. Organic and Biomolecular Chemistry, 2011, 9, 473-479. | 2.8 | 62 |
| 9 | Intramolecular Homolytic Substitution at Selenium:â€‰ Synthesis of Novel Selenium-Containing Vitamin E Analogues. Journal of Organic Chemistry, 2001, 66, 6286-6290. | 3.2 | 56 |
| 10 | Oxidation of Low-Density Lipoproteins Induces Amyloid-like Structures That Are Recognized by Macrophages. Biochemistry, 2005, 44, 9108-9116. | 2.5 | 55 |
| 11 | Homolytic substitution at selenium: ring closure of Ï‰-(benzylseleno)alkyl radicals. Tetrahedron, 1993, 49, 2557-2566. | 1.9 | 54 |
| 12 | On the existence of SH3, SeH3, and TeH3: Discrepancies between all-electron and pseudopotential calculations. Journal of Computational Chemistry, 1995, 16, 1055-1066. | 3.3 | 54 |
| 13 | Selenosartans: Novel selenophene analogues of milfasartan and eprosartan. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 1241-1244. | 2.2 | 54 |
| 14 | Unexpected Leaving Ability of (Phenyltelluro)formates in the Presence of Internal Nucleophiles:â€‰ Complications during Alkyl and Oxyacyl Radical Generation in the Preparation of Sulfur- and Selenium-Containing Heterocycles. Journal of Organic Chemistry, 1998, 63, 3032-3036. | 3.2 | 51 |
| 15 | Preparation of 5-Selenopentopyranose Sugars from Pentose Starting Materials by Samarium(II) Iodide or (Phenylseleno)formate Mediated Ring Closures. Tetrahedron, 2000, 56, 3995-4000. | 1.9 | 49 |
| 16 | Intramolecular Homolytic Substitution Chemistry:Â An ab Initio Study of 1,n-Chalcogenyl Group Transfer and Cyclization Reactions in Some Ï‰-Chalcogenylalkyl Radicals. Journal of Organic Chemistry, 1999, 64, 1131-1139. | 3.2 | 45 |
| 17 | On the stability of 2-aminoselenophene-3-carboxylates: potential dual-acting selenium-containing allosteric enhancers of A1 adenosine receptor binding. Organic and Biomolecular Chemistry, 2007, 5, 1276. | 2.8 | 43 |
| 18 | Taming the free radical shrew ? learning to control homolytic reactions at higher heteroatoms. Chemical Communications, 2006, , 4055. | 4.1 | 40 |

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|---|---|---|---|
| 19 | Homolytic substitution at selenium: A convenient synthesis of benzoselenophenes. Tetrahedron Letters, 1992, 33, 5137-5140. | 1.4 | 38 |
| 20 | Structureâ€“activity relationships of adenosines with heterocyclic N6-substituents. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 6779-6784. | 2.2 | 38 |
| 21 | Organostannanes Derived from (â^')-Menthol:â€‰ Controlling Stereochemistry during the Preparation of (1R,2S,5R)-Menthyldiphenyltin Hydride and Bis((1R,2S,5R)-menthyl)phenyltin Hydride. Organometallics, 1999, 18, 3342-3347. | 2.3 | 37 |
| 22 | Free Radical Homolytic Substitution by the Frontside Mechanism:Â Ab Initio Study of Homolytic Substitution Reactions at Silicon, Germanium, and Tin. Organometallics, 2000, 19, 1239-1246. | 2.3 | 37 |
| 23 | Preparation of novel selenapenams and selenacephems by nucleophilic and radical chemistry involving benzyl selenides. Organic and Biomolecular Chemistry, 2004, 2, 2612. | 2.8 | 36 |
| 24 | Homolytic substitution by iminyl radical at selenium: A free-radical route to 1,2-benzoselenazoles. Tetrahedron Letters, 1993, 34, 4347-4348. | 1.4 | 33 |
| 25 | Preventing Protein Oxidation with Sugars: Scavenging of Hypohalous Acids by 5-Selenopyranose and 4-Selenofuranose Derivatives. Chemical Research in Toxicology, 2012, 25, 2589-2599. | 3.3 | 33 |
| 26 | Synthesis and antioxidant capacity of 5-selenopyranose derivatives. Chemical Communications, 2011, 47, 9693. | 4.1 | 31 |
| 27 | An electron spin resonance study of the 2,5-diphenylchalcophene radical ions. Journal of Organometallic Chemistry, 1990, 389, 301-313. | 1.8 | 29 |
| 28 | Catalytic oxidant scavenging by selenium-containing compounds: Reduction of selenoxides and N-chloramines by thiols and redox enzymes. Redox Biology, 2017, 12, 872-882. | 9.0 | 29 |
| 29 | Kinetics of reaction of peroxynitrite with selenium- and sulfur-containing compounds: Absolute rate constants and assessment of biological significance. Free Radical Biology and Medicine, 2015, 89, 1049-1056. | 2.9 | 28 |
| 30 | Selenium dioxide-promoted selective synthesis of mono- and bis-sulfenylindoles. Organic Chemistry Frontiers, 2018, 5, 1983-1991. | 4.5 | 28 |
| 31 | Intramolecular homolytic substitution at tellurium: Preparation of a dihydrotellurophene by alkyltelluride-mediated SRN1/SHi reactions. Tetrahedron Letters, 1997, 38, 8429-8432. | 1.4 | 27 |
| 32 | Understanding (the lack of) homolytic substitution chemistry of sulfones. Chemical Communications, 2012, 48, 8326. | 4.1 | 27 |
| 33 | Palladium-Mediated Reactions of Chloroformates with Phenylselenotris(trimethylsilyl)silane and Aryltellurotris(trimethylsilyl)silane:Â Improved Procedure for the Preparation of (Phenylseleno)- and (Aryltelluro)formates. Journal of Organic Chemistry, 1998, 63, 5713-5715. | 3.2 | 26 |
| 34 | Unexpected dual orbital effects in radical addition reactions involving acyl, silyl and related radicals. Chemical Communications, 2006, , 1067. | 4.1 | 26 |
| 35 | 1,4-Anhydro-4-seleno-d-talitol (SeTal) protects endothelial function in the mouse aorta by scavenging superoxide radicals under conditions of acute oxidative stress. Biochemical Pharmacology, 2017, 128, 34-45. | 4.4 | 25 |
| 36 | Reactivity of selenium-containing compounds with myeloperoxidase-derived chlorinating oxidants: Second-order rate constants and implications for biological damage. Free Radical Biology and Medicine, 2015, 84, 279-288. | 2.9 | 22 |

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|---|---|---|---|
| 37 | Treasures from the Free Radical Renaissance Period â€“ Miscellaneous hexenyl radical kinetic data. Organic and Biomolecular Chemistry, 2011, 9, 1736-1743. | 2.8 | 21 |
| 38 | 1,4-Anhydro-4-seleno-d-talitol (SeTal): a remarkable selenium-containing therapeutic molecule. New Journal of Chemistry, 2019, 43, 9759-9765. | 2.8 | 21 |
| 39 | Intramolecular Homolytic Translocation Chemistry:Â An ab Initio Study of 1,n-Halogen Atom Transfer Reactions in Some Ï‰-Haloalkyl Radicals. Journal of Organic Chemistry, 1998, 63, 670-676. | 3.2 | 20 |
| 40 | An ab initio and DFT study of homolytic substitution reactions of acyl radicals at sulfur, selenium, and tellurium. New Journal of Chemistry, 2010, 34, 1692. | 2.8 | 20 |
| 41 | Preparation of 2,3-dihydroselenolo[2,3-b]pyridines and related compounds by free-radical means. Organic and Biomolecular Chemistry, 2006, 4, 466-474. | 2.8 | 18 |
| 42 | Synthesis of chiral organotin hydrides containing menthyl and oxazoline substituentsâ€. Dalton Transactions RSC, 2000, , 3693-3698. | 2.3 | 15 |
| 43 | Selenochromanes via tandem homolytic addition/substitution chemistry. Chemical Communications, 2010, 46, 565-567. | 4.1 | 14 |
| 44 | Toward Pyridine-Fused Selenium-Containing Antioxidants. Molecules, 2004, 9, 472-479. | 3.8 | 13 |
| 45 | Rate coefficients for intramolecular homolytic substitution of oxyacyl radicals at selenium. International Journal of Chemical Kinetics, 2012, 44, 51-58. | 1.6 | 13 |
| 46 | Synthesis and antioxidant capacity of novel stable 5-tellurofuranose derivatives. Chemical Communications, 2018, 54, 2990-2993. | 4.1 | 12 |
| 47 | 7-Selenabicyclo[2.2.1]heptane. Chemical Communications, 2012, 48, 9126. | 4.1 | 11 |
| 48 | Steric trends and kinetic parameters for radical reductions involving alkyldiphenyltin hydrides. Journal of Physical Organic Chemistry, 1999, 12, 233-239. | 1.9 | 10 |
| 49 | Polysilane and related radical rearrangements: an ab initio study of (1,2)-silyl, germyl and stannyl translocations in radicals derived from trisilanes and related speciesâ€. Perkin Transactions II RSC, 2001, , 939-945. | 1.1 | 10 |
| 50 | The kinetics of alkyl radical ring closures at selenium: formation of selenane. Organic Chemistry Frontiers, 2014, 1, 645-651. | 4.5 | 10 |
| 51 | Dual action molecules: Bioassays of combined novel antioxidants and angiotensin II receptor antagonists. European Journal of Pharmacology, 2012, 695, 96-103. | 3.5 | 9 |
| 52 | Effects of a novel selenium substituted-sugar (1,4-anhydro-4-seleno-d-talitol, SeTal) on human coronary artery cell lines and mouse aortic rings. Biochemical Pharmacology, 2020, 173, 113631. | 4.4 | 9 |
| 53 | Carbonâ^'Silicon Hyperconjugation and Strain-Enhanced Hyperconjugation:â€‰ Structures of N-Methyl 2- and 4-tert-Butyldimethylsilylmethyl Pyridinium Cations. Organometallics, 2007, 26, 1361-1364. | 2.3 | 7 |
| 54 | The effect of leaving radical on the formation of tetrahydroselenophene by S<sub>H</sub>i ring closure: an experimental and computational study. Organic and Biomolecular Chemistry, 2015, 13, 2310-2316. | 2.8 | 7 |

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| 55 | Fluorescent Angiotensin AT<sub>1</sub> Receptor Antagonists. Asian Journal of Organic Chemistry, 2012, 1, 274-279. | 2.7 | 6 |
| 56 | Suppressive effect of 1,4-anhydro-4-seleno-D-talitol (SeTal) on atopic dermatitis-like skin lesions in mice through regulation of inflammatory mediators. Journal of Trace Elements in Medicine and Biology, 2021, 67, 126795. | 3.0 | 6 |
| 57 | Rate Coefficients for Intramolecular Homolytic Substitution of Oxyacyl Radicals at Sulfur. Australian Journal of Chemistry, 2013, 66, 323. | 0.9 | 5 |
| 58 | Slow homolytic substitution reactions at selenium: 2-Selenabicyclo[1.1.1]pentane. Computational and Theoretical Chemistry, 2015, 1068, 128-133. | 2.5 | 4 |
| 59 | Synthetic Uses of R3MH (M = Ge, Sn, Pb). , 0, , 1401-1483. | | 3 |
| 60 | The quest for selenocycles: From an ESR spectrum to a commercial product. Journal of Chemical Research, 2022, 46, 174751982210895. | 1.3 | 2 |
| 61 | A simple model of the hydrophobic effect for molecular simulation of interfacial phenomena. Molecular Simulation, 2002, 28, 791-806. | 2.0 | 1 |
| 62 | Radical Cyclisation of Î±â€Halo Aluminium Acetals: A Mechanistic Study. Chemistry - A European Journal, 2016, 22, 4809-4824. | 3.3 | 1 |
| 63 | Intramolecular homolytic substitution in selenoxides and selenones. Tetrahedron, 2016, 72, 7790-7795. | 1.9 | 1 |
| 64 | Semisynthetic bioactive organoselenium and organotellurium compounds. , 2022, , 253-289. | | 1 |
| 65 | Art for bugs: â€˜culturedâ€™ microorganisms. AICCM Bulletin, 2013, 34, 102-111. | 0.1 | 0 |