

# Coordination Chemistry

NHC; Metal–Carbene Complexes

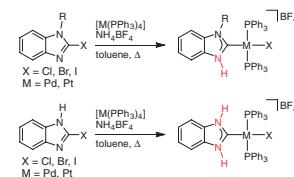
OPEN Highlight Review

doi:10.1246/cl.141052



## Complexes Bearing Protic N-Heterocyclic Carbenes: Synthesis and Applications

Mareike C. Jahnke and F. Ekkehardt Hahn\*  
*Chem. Lett.* 2015, 44, 226-237



Coordination Polymer; Spin-crossover Complex

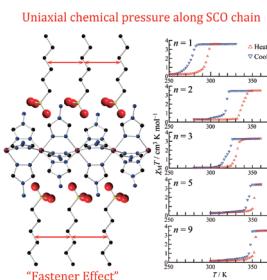
Selected Paper

doi:10.1246/bcsj.20140361



## Fastener Effect on Uniaxial Chemical Pressure for One-Dimensional Spin-Crossover System, $[Fe^{II}(NH_2-trz)_3 \cdot (C_nH_{2n+1}SO_3)_2 \cdot xH_2O]$ : Magnetostructural Correlation and Ligand Field Analysis

Hajime Kamebuchi, Akio Nakamoto, Toshihiko Yokoyama, and Norimichi Kojima\*  
*Bull. Chem. Soc. Jpn.* 2015, 88, 419-430



Pincer Complex; Secondary Thioamide Ligands

OPEN Highlight Review

doi:10.1246/cl.140996



## Secondary Thioamides as Multidentate Ligands for Functional Metal Complexes

Ken Okamoto, Junpei Kuwabara, and Takaki Kanbara\*  
*Chem. Lett.* 2015, 44, 102-110



Mo-Catecholato Complexes; Br-Catechol Ligands

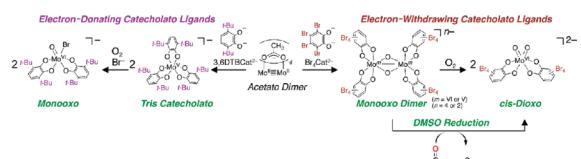
Selected Paper

doi:10.1246/bcsj.20140208



## Syntheses and Structures of Molybdenum-Oxo Complexes Prepared by the Reactions of $[Mo^{II}(OAc)_4]$ with *tert*-Butyl- or Bromo-Substituted Catechols

Takeshi Matsumoto, Hirokazu Yano, Masanori Wakizaka, Atsushi Kobayashi, Masako Kato,\* and Ho-Chol Chang\*  
*Bull. Chem. Soc. Jpn.* 2015, 88, 74-83



Cuprate Spin Ladder; Quantum Magnets

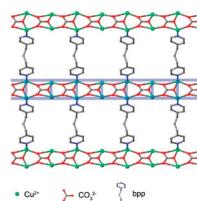
OPEN Editor's Choice

doi:10.1246/cl.140657



## A Cuprate Spin Ladder Linked by a Pyridyl Ligand

Xiao Zhang, Sadafumi Nishihara\*, Yuki Nakano, Kseniya Yu. Maryunina, and Katsuya Inoue\*  
*Chem. Lett.* 2014, 43, 1713-1715

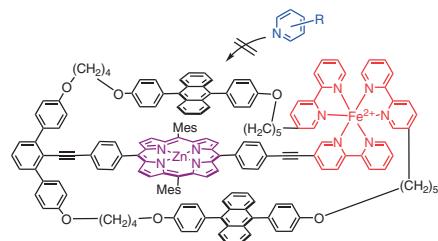




## Allosteric Regulation of the Ligand-Binding Ability of Zinc Porphyrins with Sterically Bulky Shielding Units by Metal Complexation

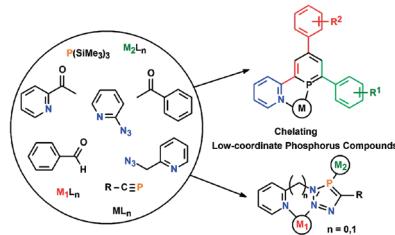
K. Okada

Yoshikazu Ninomiya, Masatoshi Kozaki,\* Shuichi Suzuki, and Keiji Okada\*  
*Bull. Chem. Soc. Jpn.* **2014**, *87*, 1195-1201



## Recent Developments in the Chemistry of Pyridyl-functionalized, Low-coordinate Phosphorus Heterocycles

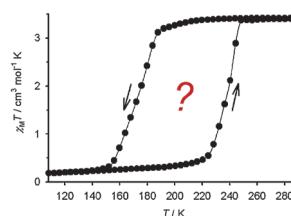
C. Müller,\* Julian A. W. Sklorz, Iris de Krom, Antonia Loibl, Marija Habicht, Marlene Bruce, Gregor Pfeifer, and Jelena Wiecko  
*Chem. Lett.* **2014**, *43*, 1390-1404



## Spin-crossover Compounds with Wide Thermal Hysteresis

M. A. Halcrow

Malcolm A. Halcrow  
*Chem. Lett.* **2014**, *43*, 1178-1188



## Coordination Programming: A New Concept for the Creation of Multifunctional Molecular Systems

H. Nishihara

Hiroshi Nishihara  
*Chem. Lett.* **2014**, *43*, 388-395



## Activation of Linear Alkanes by a Hydrido Triruthenium Cluster and Associated Skeletal Rearrangements

H. Suzuki

Toshiro Takao and Hiroharu Suzuki\*  
*Bull. Chem. Soc. Jpn.* **2014**, *87*, 443-458



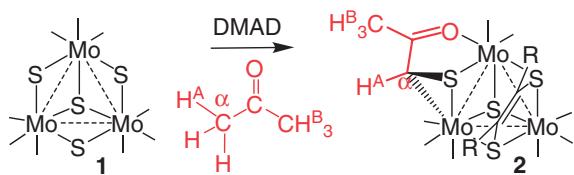


T. Shibahara

## Removal of Two Hydrogen Atoms from Ketones or Aldehyde: Reaction of a Sulfur-Bridged Incomplete Cubane-Type Molybdenum Cluster with Acetone, Acetaldehyde, Acetylacetone, Ethyl Acetoacetate, and Acetophenone

Takashi Shibahara,\* Keisuke Kawamoto, Akihiko Matsuura, Hideaki Takagi, Takanori Nishioka, Isamu Kinoshita, and Haruo Akashi

*Bull. Chem. Soc. Jpn.* **2014**, *87*, 459–469

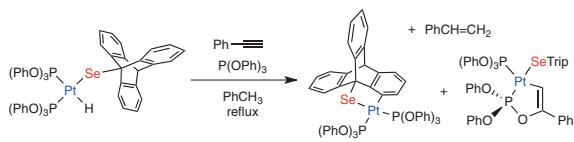


A. Ishii

## Characterization and Phenylacetylene-Assisted Cyclometalation of an Isolable Hydrido–Selenolato Pt<sup>II</sup> Complex Having Phosphite Ligands, *cis*-[PtH(SeTrip){P(OPh)<sub>3</sub>}<sub>2</sub>]

Hitomi Kamon, Yutaro Aoki, Norio Nakata, and Akihiko Ishii\*

*Bull. Chem. Soc. Jpn.* **2014**, *87*, 274–282



M. Yamashita

## Recent Progress in MMX-Chain Complexes: Unique Electronic States and Characteristics Developed by Introducing Binary Counterions

Hiroaki Iguchi,\* Shinya Takaishi, and Masahiro Yamashita\*

*Chem. Lett.* **2014**, *43*, 69–79

### MMX Chains with Binary Counterions

New Electronic States

High Electrical Conductivity

Water-Vapor-Induced Reversible Switching

Nonlinear Conduction

Single-Crystal-to-Single-Crystal Transformation

Electrochemically Active Framework

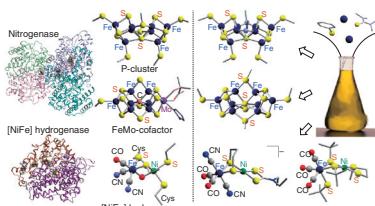


Y. Ohki

## Synthetic Analogues of the Active Sites of Nitrogenase and [NiFe] Hydrogenase

Yasuhiro Ohki

*Bull. Chem. Soc. Jpn.* **2014**, *87*, 1–19

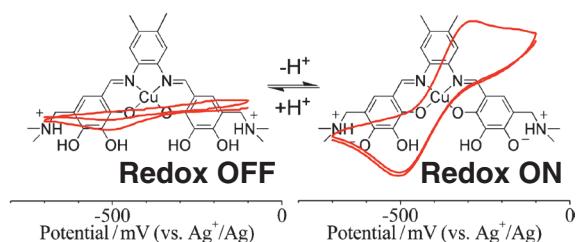




**A Redox-Active, Amphoteric Pyrogallolaldehyde Derivative: Electrochemical Characterization and Schiff Base Formation for Constructing Multifunctional Salphen Complexes**

H. Houjou

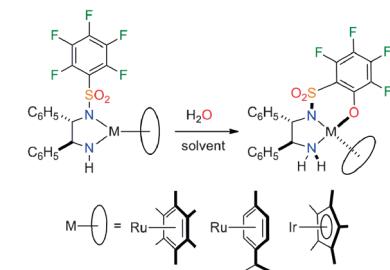
Hajime Shingai, Hirohiko Houjou,\*  
Isao Yoshikawa, and Koji Araki  
*Bull. Chem. Soc. Jpn.* **2013**, *86*, 698-706



**C-F Bond Breaking through Aromatic Nucleophilic Substitution with a Hydroxo Ligand Mediated via Water Bifunctional Activation**

T. Ikariya

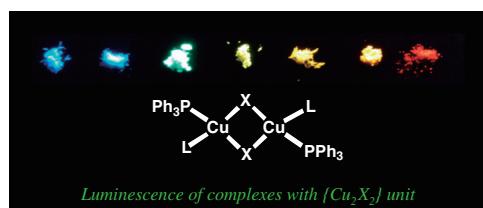
Pavel A. Dub, Hui Wang, Asuka Matsunami,  
Ilya D. Gridnev, Shigeki Kuwata, and  
Takao Ikariya\*  
*Bull. Chem. Soc. Jpn.* **2013**, *86*, 557-568



**Luminescent Complexes Containing Halogeno-bridged Dicopper(I) Unit  $\{\text{Cu}_2(\mu\text{-X})_2\}$  ( $\text{X} = \text{Cl}, \text{Br}, \text{and I}$ )**

K. Tsuge

Kiyoshi Tsuge  
*Chem. Lett.* **2013**, *42*, 204-208



**Inner-Sphere Structure of Rhodium Complexes with Tin(II) Chloride in Concentrated Hydrochloric Acid Solution**

H. Narita

Hirokazu Narita,\* Mikiya Tanaka,  
Hideaki Shiwaku, Yoshihiro Okamoto,  
Atsushi Ikeda-Ohno, and Tsuyoshi Yaita  
*Bull. Chem. Soc. Jpn.* **2013**, *86*, 203-209

