Original papers

1. Substrate-specific activation and long-range olefin migration catalysis at the Pd centers in a porous metal-macrocycle framework
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5. Site-selective binding of terpenoids within a confined space of metal–macrocycle framework: Substrate-specific promotion or inhibition of cyclization reactions
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総説・解説

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競争的研究資金（研究代表者）
1. JST さきがけ（原子・分子の自在配列と特性・機能）（令和 4-7 年度）“結晶内分子配列に基づくバイオリファイナリー”

2. 学術変革領域研究(A)（2.5 次元物質科学）公募研究（令和 4-5 年度）“環状中空分子の二次元集積化に基づく 2.5 次元ナノ空間の創製と機能化”

3. 新学術領域研究（水圏機能材料）公募研究（令和 4-5 年度）“非対称水和ネットワーク構造を有する多孔性水圏材料の機能化”

4. 公益財団法人 藤森科学技術振興財団 2022 年度 研究助成（令和 4 年度）“超分子結晶触媒によるフラウン誘導体の精密分子認識と立体選択的変換反応の開発”

5. 公益財団法人 徳山科学技術振興財団 2022 年度 研究助成（令和 4 年度）“金属有機クラスターをノードとした非対称配位高分子の精密設計”

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移動とキラネじれ反転運動が同期する白金三核ナノマシン錯体の合成

7. 公益財団法人 池谷科学技術振興財団 単年度研究助成（令和 3 年度）“認識ボケットを備えた結晶ナノチャネルによる超高速結晶スポンジ法の開発”

8. 公益財団法人 クリタ水・環境科学振興財団 国内研究助成（令和 2 年 10 月 1 日より 1 年）“多孔性結晶を観察場とした水－エタノール溶液構造の可視化”

9. 挑戦的研究（萌芽）（令和元年－2 年度）“多孔性配位高分子を鋳型とした相互貫入ジェルジム型高分子の精密合成”

10. 田中貴金属記念財団 2018 年度貴金属に関わる研究助成金 奨励賞（平成 31 年度）“分子認識結晶 MMF とナノ"金"平糖の高効率複合化と応用化”

11. 新学術領域研究（ソフトクリスタル）公募研究（平成 30–31 年度）“分子配列能を備えた多孔性結晶細孔におけるソフトクリスタリゼーション法の開発”

12. 挑戦的萌芽研究（平成 28–29 年度）“多孔性分子結晶の面選択的接合を介した異方集積体ポラス材料の創製”

13. 新学術領域研究（分子アーキテクト）公募研究（平成 28–29 年度）“構造・物性を多状態制御できる超分子錯体ナノファイバーの創製”

14. 若手研究 A（平成 27–30 年度）“結晶細孔内での精密分子配列に基づく超分子酵素の開発”

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16. 挑戦的萌芽研究（平成 23–24 年度）“配位結合駆動型メタロペプチドフォルダマーの創製”

17. 若手研究 B（平成 20–21 年度）“環境多核金属錯体による孤立した水クラスター「ナノ水滴」の構築と精密機能化”

受賞歴

1. 田中貴金属記念財団 2018 年度貴金属に関わる研究助成金 奨励賞 平成 31 年 3 月 28 日
“分子認識結晶 MMF とナノ"金"平糖の高効率複合化と応用化”

2. 平成 29 年度総合学芸学会研究奨励賞 平成 29 年 9 月 17 日
“環状多核金属錯体の自己組織化による多孔性機能材料の創製”

3. 日本化学会第 93 春季年会 優秀講演賞（学術） 平成 25 年 3 月
“人工オキシムペプチドを用いた金属配位駆動型メタロフォルダマーの構築と可逆な構造変換”

4. Bulletin of the Chemical Society of Japan 誌 BCSJ Award Article 平成 18 年 6 月
“Selective Recognition of Trp- and Tyr-Rich Oligopeptides by Self-Assembled Coordination Hosts”

5. 日本化学会第 85 春季年会 学生講演賞 平成 17 年 3 月
“自己集合性かご型錯体の内部空間におけるペプチドの配列認識と配座制御”
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