論文リスト (List of Papers)

森本 真弘 (Masahiro Morimoto)

査読付き論文 (Peer-reviewed papers)

- [1] M. Morimoto, The heat operator of a transversally elliptic operator, JP Journal of Geometry and Topology, Vol. 20, Issue 4, 369-408 (2017).
- [2] M. Morimoto, On weakly reflective PF submanifolds in Hilbert spaces, Tokyo J. Math. 44 (2021), no. 1, 103-124.
- [3] M. Morimoto, Austere and arid properties for PF submanifolds in Hilbert spaces, Differential Geom. Appl. **69** (2020), 101613, 24pp.
- [4] M. Morimoto, On weakly reflective submanifolds in compact isotropy irreducible Riemannian homogeneous spaces, to appear in Tokyo J. Math.

プレプリント (Preprint)

- [5] M. Morimoto, Curvatures and austere property of orbits of path group actions induced by Hermann actions, arXiv:2105.12533 (34 pages), submitted.
- [6] M. Morimoto, On the geometry of orbits of path group actions induced by sigmaactions, arXiv:2201.01662 (18 pages).

準備中論文 (In preparation)

[7] M. Morimoto, On weakly reflective submanifolds in symmetric spaces, in preparation.

学位論文 (Thesis)

- [1] M. Morimoto, Representations of compact Lie groups and transversally elliptic operators, Master thesis (2017), Kyoto University.
- [2] M. Morimoto, Minimal PF submanifolds in Hilbert spaces with symmetries, Doctoral thesis (2020), Osaka City University.

査読無し論文 (Non peer-reviewed papers)

- [1] 森本真弘, コンパクト・リー群の表現と横断的楕円型作用素, 研究集会「第 14 回城崎新人セミナー」報告集 (2017).
- [2] M. Morimoto, The spectral properties of transversally elliptic operators and some applications, Proceedings of The 21st International Workshop on Hermitian Symmetric Spaces and Submanifolds 21, 69-77 (2017).
- [3] 森本真弘, ヒルベルト空間の弱鏡映部分多様体について, 研究集会「部分多様体論・湯沢 2018」報告集 (2018).

- [4] 森本真弘, ヒルベルト空間の弱鏡映部分多様体について, 研究集会「第2回数理 新人セミナー」報告集 (2019).
- [5] 森本真弘, ヒルベルト空間の弱鏡映 PF 部分多様体について, 学会「第 66 回幾何 学シンポジウム」予稿集 100 - 104 (2019).
- [6] 森本真弘, 対称性をもつ極小 PF 部分多様体について, 研究集会「部分多様体幾何 とリー群作用 2019」予稿集 pp. 27 - 34 (2019). doi:10.24544/ocu.20200120-001
- [7] M. Morimoto, On the geometry of orbits of path group actions induced by Hermann actions, 部分多様体オンライン 2020, 報告集. doi: 10.24544/ocu.20200120-001
- [8] M. Morimoto, On minimal PF submanifolds in Hilbert spaces with symmetries, Report for the workshop: The 27th Osaka City University International Academic Symposium "Mathematical Science of Visualization, and Deepening of Symmetry and Moduli" OCAMI Reports, Vol. 1 (2021), 40-41. doi: 10.24544/ocu.20210605-001
- [9] M. Morimoto, Minimal PF submanifolds in Hilbert spaces with symmetries, Report for the workshop: Submanifolds of Symmetric Spaces and Their Time Evolutions OCAMI Reports, Vol. 2 (2021), 78-100 doi: 10.24544/ocu.20210605-002
- [10] M. Morimoto, On the converse problem for austere orbits of path group actions induced by Hermann actions, Proceedings of The 23rd International Differential Geometry Workshop on Submanifolds in Homogeneous Spaces & Related Topics 23 (2021).

講演リスト (List of talks)

- [1] M. Morimoto, "Representations of compact Lie groups and transversally elliptic operators", HeKKSaGOn Working Group Seeds in Mathematics versus Needs outside Mathematics Winter School in Osaka 2017, Osaka University, Osaka, Japan, March 9, 2017 (口頭発表, 招待有り).
- [2] 森本真弘, "Representations of compact Lie groups and transversally elliptic operators", 第 14 回城崎新人セミナー, 城崎市民センター, 豊岡市, 2017 年 2 月 15 日 (口頭発表).
- [3] 森本真弘 「横断的楕円型作用素と熱作用素」,院生談話会,阪市大,2017年6 月2日(口頭発表,招待有り).
- [4] M. Morimoto, "Elliptic operators and compact groups", International Workshop on Differential Geometric Aspects of Integrable Systems, Kobe Univ. July 18, 2017 (口頭発表, 招待有り).
- [5] M. Morimoto, "Elliptic operators and compact groups", The 11th Graduate Student Workshop on Mathematics, Osaka City Univercity July 25, 2017 (口頭 発表).

- [6] 森本真弘,「横断的楕円型作用素と熱作用素」, 日本数学会秋季総合分科会一般 講演,山形大学,山形市,2017年9月11日(口頭発表).
- [7] M. Morimoto, "The heat operator of a transversally elliptic operator", The 21th International Workshop on Hermitian Symmetric Spaces and Submanifolds, Kyungpook National University, Daegu, Korea, October 12, 2017 (口頭発表).
- [8] M. Morimoto, "The spectral properties of transversally elliptic operators and some applications", International Workshop, Geometry of Submanifolds and Integrable Systems, Osaka City University, March 26, 2018 (口頭発表, 招待有り).
- [9] M. Morimoto, "Infinite dimensional group actions and submanifold geometry", The 12th Graduate Student Workshop on Mathematics, Hotel Nongshim, Dongnaegu, Busan, Korea, July 24, 2018 (口頭発表).
- [10] 森本真弘, 「Hilbert 空間における無限次元弱鏡映部分多様体について」, 部分多様体論・湯沢 2018, 湯沢グランドホテル, 湯沢町, 2018 年 11 月 29 日 (口頭発表).
- [11] 森本真弘 "On weakly reflective PF submanifolds in Hilbert spaces", 第 2 回 数 理新人セミナー, 京都大学, 2019年1月12日 (口頭発表).
- [12] M. Morimoto, "On weakly reflective PF submanifolds in Hilbert spaces", The 2nd International Conference, Geometry of Submanifolds and Integrable Systems, Osaka City University, Osaka, March 22, 2019 (口頭発表, 招待有り).
- [13] M. Morimoto, "On weakly reflective PF submanifolds in Hilbert spaces", The 13th Graduate Student Workshop on Mathematics, Osaka City University, Osaka, July 30, 2019 (口頭発表).
- [14] 森本真弘,「ヒルベルト空間の弱鏡映 PF 部分多様体について」,第 66 回幾何学シンポジウム,名古屋大学,名古屋市,2019年8月27日(口頭発表).
- [15] M. Morimoto, "On weakly reflective PF submanifolds in Hilbert spaces", Oberseminar Differentialgeometrie, University of Augsburg, Germany, September 10, 2019 (口頭発表).
- [16] 森本真弘,「ヒルベルト空間の弱鏡映 PF 部分多様体について」,日本数学会 2019 年度秋季総合分科会 一般講演,金沢大学,金沢市,2019 年 9 月 17 日 (口頭発表).
- [17] 森本真弘,「対称性をもつ極小 PF 部分多様体について」,広島幾何学研究集会 2019,広島大学,東広島市,2019年10月9日(口頭発表,招待有り).
- [18] 森本真弘,「対称性をもつ極小 PF 部分多様体について」, 部分多様体幾何とリー群作用 2019, 東京理科大学森戸記念館, 新宿区, 2019 年 12 月 25 日 (水) (口頭発表, 招待有り).
- [19] M. Morimoto, "Minimal PF submanifolds in Hilbert spaces with symmetries", The 18th OCAMI-RIRCM Joint Differential Geometry Workshop on "Differential Geometry of Submanifolds in Symmetric Spaces and Related Problems", Osaka City University, February 18, 2019 (口頭発表,招待有り).

- [20] 森本真弘,「ヒルベルト空間の PF 部分多様体のオースティア性とアリッド性」, 日本数学会 2020 年度年会,一般講演,日本大学理工学部,2020 年 3 月 18 日.
- [21] 森本真弘,「ヒルベルト空間内の対称性をもつ極小固有フレドホルム部分多様体」, 筑波大学微分幾何学セミナー, Zoom オンライン講演, 2020年 11月4日 (水). (口頭発表, 招待有り)
- [22] 森本真弘,「Hermann 作用から誘導される path 群作用の軌道の幾何学」, 部分多様体オンライン 2020, 12月 26日 (土). (口頭発表, 招待有り)
- [23] M. Morimoto, "Minimal PF submanifolds in Hilbert spaces with symmetries", Submanifolds of Symmetric Spaces and their Time Evolutions, Osaka City University, March 5-6, 2021 (postponed). (口頭発表, 招待有り)
- [24] 森本真弘,「コンパクト・イソトロピー既約リーマン等質空間内の弱鏡映部分多様体について」,日本数学会 2021 年度年会,一般講演,慶應義塾大学理工学部,2021年3月15日(月).
- [25] M. Morimoto, "On minimal PF submanifolds in Hilbert spaces with symmetries", The 27th Osaka City University International Academic Symposium, Mathematical Science of Visualization, and Deepening of Symmetry and Moduli, Osaka City University, March 24, 2021. (口頭発表,招待有り)
- [26] M. Morimoto, "Curvatures and austere property of orbits of path group actions induced by Hermann actions", Differential Geometry of Submanifolds in Symmetric Spaces and Related Problems, Osaka City University, July 2-3, 2021. (口 頭発表, 招待有り)
- [27] M. Morimoto, "Curvatures and austere property of orbits of path group actions induced by Hermann actions", The 3rd Japan-Taiwan Joint Conference on Differential Geometry, Osaka City University, November 1-3, 2021. (口頭発表, 招待有り)
- [28] M. Morimoto, "(Talk Title: TBA), Geometry of symmetric spaces and group actions", Online, February 17-19, 2022. (口頭発表, 招待有り)

(以下、申し込み済み、開催延期中のもの)

[1] M. Morimoto, "On minimal PF submanifolds in Hilbert spaces with symmetries", Geometry, Stochastics, & Dynamics: Celebrating 20 years of UK-Japan Winter Schools, the University of Warwick, United Kingdom, May 2020 (ポスター発表).