

Fangfei LI
Assistant Professor
Chinese Medicine - Teaching and Research Division
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Chinese Name

李芳菲

Qualifications

PhD, UNSW Sydney
Award Date: 31 Dec 2013

Employment

Assistant Professor
Chinese Medicine - Teaching and Research Division
Hong Kong Baptist University
Hong Kong
1 Sept 2024 → present

Research outputs

Aloperine Suppresses Cancer Progression by Interacting with VPS4A to Inhibit Autophagosome-lysosome Fusion in NSCLC

Guo, W., Zhou, H., Wang, J., Lu, J., Dong, Y., Kang, Z., Qiu, X., Ouyang, X., Chen, Q., Li, J., Cheng, X., Du, K., Li, M., Lin, Z., Jin, M., Zhang, L., Sarapultsev, A., Shi, K., Li, F., Zhang, G., & 8 others Wu, K., Rong, Y., Heissmeyer, V., Liu, Y., Li, Y., Huang, K., Luo, S. & Hu, D., 21 Aug 2024, In: *Advanced Science*. 11, 31, 21 p., 2308307.

Advancing targeted combination chemotherapy in triple negative breast cancer: nucleolin aptamer-mediated controlled drug release

Ma, Y., Xie, D., Chen, Z., Shen, X., Wu, X., Ding, F., Ding, S., Pan, Y., Li, F., Lu, A. & Zhang, G., 1 Jul 2024, In: *Journal of Translational Medicine*. 22, 1, 13 p., 604.

Research on drug treatment and the novel signaling pathway of chronic atrophic gastritis

Jao, J., Zhao, H., Li, F., Zheng, Q., Wang, G., Li, D. & Liu, Y., Jul 2024, In: *Biomedicine and Pharmacotherapy*. 176, 20 p., 116912.

Sclerostin inhibition in rare bone diseases: Molecular understanding and therapeutic perspectives

Tao, X., Wang, L., Yang, X., Jiang, H., Zhang, N., Zhang, H., Li, D., Li, X., Zhang, Y., Wang, S., Zhong, C., Yu, S., Ren, M., Sun, M., Li, N., Chen, T., Ma, Y., Li, F., Liu, J., Yu, Y., & 3 others Yue, H., Zhang, Z. & Zhang, G., Jul 2024, In: *Journal of Orthopaedic Translation*. 47, p. 39-49 11 p.

Single-cell profile reveals the landscape of cardiac immunity and identifies a cardio-protective Ym-1hi neutrophil in myocardial ischemia-reperfusion injury

Dong, Y., Kang, Z., Zhang, Z., Zhang, Y., Zhou, H., Liu, Y., Shuai, X., Li, J., Yin, L., Wang, X., Ma, Y., Fan, H., Jiang, F., Lin, Z., Ding, C., Jin, K. Y., Sarapultsev, A., Li, F., Zhang, G., Xie, T., & 5 others Yin, C., Cheng, X., Luo, S., Liu, Y. & Hu, D., 15 Apr 2024, In: *Science Bulletin*. 69, 7, p. 949-967 19 p.

Inflammatory gene-based subtyping of osteosarcoma patients reveals the association of inflammation in tumor microenvironment with better survival

Yang, L., Sheng, Y., Qiao, S., Hu, D., Chowdhury, D., Yip, H. F., Chen, Z., He, Y., Lu, A. & Li, F., 15 Mar 2024, In: *Cancer Research*. 84, 6 (Supplement), 5459.

Intracellular sclerostin plays a vital role in tumor progression and metastasis in triple-negative breast cancer

Sun, M., Qiao, S., Luo, H., Yang, X., Yang, L., Zhang, H., Chen, Z., Wang, L., Tao, X., Yu, Y., Ma, Y., Yuan, F., Ma, D., Chen, Q., Lu, A., Zhang, B. T., Zhang, G. & Li, F., 1 Feb 2024, In: *Cancer Research*. 84, 3, Supplement 1, B044.

Discovery of a core inflammatory gene network associated with poor prognosis and characterized immune infiltration pattern in pancreatic ductal adenocarcinoma

Yang, L., Chen, Z., Sheng, Y., Chowdhury, D., Yip, H. F., Qiao, S., Sun, M., Lu, A. & Li, F., 15 Jan 2024, In: *Cancer Research*. 84, 2 (Supplement), C042.

A core inflammatory gene network associated with poor prognosis serves chemokine production in cancer associated fibroblasts in pancreatic ductal adenocarcinoma

Li, F., Yang, L., Chen, Z., Qiao, S., Sheng, Y., Chowdhury, D., Yip, H. F., Sun, M. & Lu, A., 1 Dec 2023, In: *Cancer Immunology Research*. 11, 12, Supplement, B043.

Mechanistic Insights into the Roles of the IL-17/IL-17R Families in Pancreatic Cancer

Chen, Z., Qiao, S., Yang, L., Sun, M., Li, B., Lu, A. & Li, F., 1 Sept 2023, In: *International Journal of Molecular Sciences*. 24, 17, 15 p., 13539.

Timosaponin AIII promotes non-small-cell lung cancer ferroptosis through targeting and facilitating HSP90 mediated GPX4 ubiquitination and degradation

Zhou, C., Yu, T., Zhu, R., Lu, J., Ouyang, X., Zhang, Z., Chen, Q., Li, J., Cui, J., Jiang, F., Jin, K. Y., Sarapultsev, A., Li, F., Zhang, G., Luo, S. & Hu, D., 27 Feb 2023, In: *International Journal of Biological Sciences*. 19, 5, p. 1471-1489 19 p.

Taraxasterol Inhibits Tumor Growth by Inducing Apoptosis and Modulating the Tumor Microenvironment in Non-Small Cell Lung Cancer

Lu, J., Shuai, B., Shou, Z., Guo, W., Zhou, C., Ouyang, X., Zhou, H., Li, J., Cui, J., Jiang, F., Jin, K. Y., Sarapultsev, A., Li, F., Zhang, G., Luo, S. & Hu, D., 1 Oct 2022, In: *Cancers*. 14, 19, 21 p., 4645.

Pancreatic Cancer: Nucleic Acid Drug Discovery and Targeted Therapy

Dai, H., Abdullah, R., Wu, X., Li, F., Ma, Y., Lu, A. & Zhang, G., 16 May 2022, In: *Frontiers in Cell and Developmental Biology*. 10, 17 p., 855474.

Targeting 11 β -HSD1 in osteoblasts reduces fat mass and prevents bone loss in mice with high-fat diet-induced obesity (abstract)

Zhong, C., Li, N., Li, D., Wang, S., Zhang, H., Sun, M., Wang, Z., Xie, D., Wu, X., Li, F., Yu, S., Ma, Y., Dai, H., Amu, G., Lyu, A., Ren, F., Liu, J. & Zhang, G., Feb 2022, In: *Journal of Bone and Mineral Research*. 37, Suppl 1, p. 105 1 p.

Poly (ADP-ribose) polymerase 1 (PARP1) inhibition promotes pulmonary metastasis of osteosarcoma by boosting ezrin phosphorylation

Li, F., Wu, X., Fu, X., Liu, J., Song, W., Xiao, G. G., Lu, A. & Zhang, G., Jan 2022, In: *International Journal of Biological Sciences*. 18, 3, p. 1238-1253 16 p.

Exosomal transfer of osteoclast-derived miRNAs to chondrocytes contributes to osteoarthritis progression

Liu, J., Wu, X., Lu, J., Huang, G., Dang, L., Zhang, H., Zhong, C., Zhang, Z., Li, D., Li, F., Liang, C., Yu, Y., Zhang, B. T., Chen, L., Lu, A. & Zhang, G., 15 Apr 2021, In: *Nature Aging*. 1, 4, p. 368-384 17 p.

Recent Progress in Aptamer Discoveries and Modifications for Therapeutic Applications

Ni, S., Zhuo, Z., Pan, Y., Yu, Y., Li, F., Liu, J., Wang, L., Wu, X., Li, D., Wan, Y., Zhang, L., Yang, Z., Zhang, B-T., Lu, A. & Zhang, G., 3 Mar 2021, In: *ACS Applied Materials and Interfaces*. 13, 8, p. 9500-9519 20 p.

The Roles of Sclerostin in Immune System and the Applications of Aptamers in Immune-Related Research

Sun, M., Chen, Z., Wu, X., Yu, Y., Wang, L., Lu, A., Zhang, G. & Li, F., 25 Feb 2021, In: *Frontiers in Immunology*. 12, 10 p., 602330.

Disorders of Calcium and Phosphorus Metabolism and the Proteomics/Metabolomics-Based Research

Sun, M., Wu, X., Yu, Y., Wang, L., Xie, D., Zhang, Z., Chen, L., Lu, A., Zhang, G. & Li, F., 10 Sept 2020, In: *Frontiers in Cell and Developmental Biology*. 8, 13 p., 576110.

A PD-L1 aptamer selected by loss-gain cell-SELEX conjugated with paclitaxel for treating triple-negative breast cancer

Wu, X., Li, F., Li, Y., Yu, Y., Liang, C., Zhang, B., Zhao, C., Lu, A. & Zhang, G., 23 Jun 2020, In: *Medical Science Monitor*. 26, 10 p., e925583.

RANKL/RANK System-Based Mechanism for Breast Cancer Bone Metastasis and Related Therapeutic Strategies

Wu, X., Li, F., Dang, L., Liang, C., Lu, A. & Zhang, G., 11 Feb 2020, In: *Frontiers in Cell and Developmental Biology*. 8, 14 p., 76.

PARP1 interacts with ezrin contributing to metastasis in osteosarcoma

Li, F., Wu, X., Fu, X., Lu, A., Zhang, G. & Lim, N. J., Dec 2019, In: *Journal of Bone and Mineral Research*. 34, S1, p. 133 1 p.

HIF1 α inhibition facilitates Leflunomide-AHR-CRP signaling to attenuate bone erosion in CRP-aberrant rheumatoid arthritis

Liang, C., Li, J., Lu, C., Xie, D., Liu, J., Zhong, C., Wu, X., Dai, R., Zhang, H., Guan, D., Guo, B., He, B., Li, F., He, X., Zhang, W., Zhang, B. T., Zhang, G. & Lu, A., 8 Oct 2019, In: *Nature Communications*. 10, 13 p., 4579.

Inhibition of osteoblastic Smurf1 promotes bone formation in mouse models of distinctive age-related osteoporosis

Liang, C., Peng, S., Li, J., Lu, J., Guan, D., Jiang, F., Lu, C., Li, F., He, X., Zhu, H., Au, D. W. T., Yang, D., Zhang, B. T., Lu, A. & Zhang, G., 24 Aug 2018, In: *Nature Communications*. 9, 14 p., 3428.

The Rules and Functions of Nucleocytoplasmic Shuttling Proteins

Fu, X., Liang, C., Li, F., Wang, L., Wu, X., Lu, A., Xiao, G. & Zhang, G., 12 May 2018, In: *International Journal of Molecular Sciences*. 19, 5, 1445.

TNF- α and RANKL promote osteoclastogenesis by upregulating RANK via the NF- κ B pathway

Luo, G., Li, F., Li, X., Wang, Z. G. & Zhang, B., May 2018, In: *Molecular Medicine Reports*. 17, 5, p. 6605-6611 7 p.

Tumor cell-targeted delivery of CRISPR/Cas9 by aptamer-functionalized lipopolymer for therapeutic genome editing of VEGFA in osteosarcoma

Liang, C., Li, F., Wang, L., Zhang, Z-K., Wang, C., He, B., Li, J., Chen, Z., Shaikh, A. B., Liu, J., Wu, X., Peng, S., Dang, L., Guo, B., He, X., Au, D. W. T., Lu, C., Zhu, H., Zhang, B. T., Lu, A., & 1 othersZhang, G., Dec 2017, In: *Biomaterials*. 147, p. 68-85 18 p.

A water-soluble nucleolin aptamer-paclitaxel conjugate for tumor-specific targeting in ovarian cancer

Li, F., Lu, J., Liu, J., Liang, C., Wang, M., Wang, L., Li, D., Yao, H., Zhang, Q., Wen, J., Zhang, Z. K., Li, J., Lv, Q., He, X., Guo, B., Guan, D., Yu, Y., Dang, L., Wu, X., Li, Y., & 6 othersChen, G., Jiang, F., Sun, S., Zhang, B. T., Lyu, A. & Zhang, G., 9 Nov 2017, In: *Nature Communications*. 8, 1, 14 p., 1390.

PARP1 in carcinomas and PARP1 inhibitors as antineoplastic drugs

Wang, L., LIANG, C., LI, F., GUAN, D., Wu, X., Fu, X., LYU, A. & ZHANG, G., Oct 2017, In: *International Journal of Molecular Sciences*. 18, 10, 2111.

Probing the pharmacokinetics of cucurbit[7, 8 and 10]uril: And a dinuclear ruthenium antimicrobial complex encapsulated in cucurbit[10]uril

LI, F., Gorle, A. K., Ranson, M., Vine, K. L., Kinobe, R., Feterl, M., Warner, J. M., Keene, F. R., Collins, J. G. & Day, A. I., 21 May 2017, In: *Organic and Biomolecular Chemistry*. 15, 19, p. 4172-4179 8 p.

Osteoclastic miR-214 targets TRAF3 to contribute to osteolytic bone metastasis of breast cancer

LIU, J., LI, D., Dang, L., LIANG, C., GUO, B., Lu, C., He, X., Cheung, H. Y. S., He, B., Liu, B., LI, F., Lu, J., Wang, L., Shaikh, A. B., Jiang, F., Lu, C., Peng, S., Zhang, Z., Zhang, B. T., Pan, X., & 3 othersXiao, L., LYU, A. & ZHANG, G., 10

Jan 2017, In: Scientific Reports. 7, 13 p., 40487.

Recent methods for purification and structure determination of oligonucleotides

Zhang, Q., Lv, H., Wang, L., Chen, M., Li, F., Liang, C., Yu, Y., Jiang, F., Lyu, A. & Zhang, G., 18 Dec 2016, In: International Journal of Molecular Sciences. 17, 12, 2134.

A mini-review for cancer immunotherapy: Molecular understanding of PD-1/ PD-L1 pathway & translational blockade of immune checkpoints

Li, Y., Li, F., Jiang, F., Lv, X., Zhang, R., Lyu, A. & Zhang, G., 18 Jul 2016, In: International Journal of Molecular Sciences. 17, 7, 22 p., 1151.

Oligonuclear polypyridylruthenium(II) complexes: Selectivity between bacteria and eukaryotic cells

Gorle, A. K., Li, X., Primrose, S., Li, F., Feterl, M., Kinobe, R. T., Heimann, K., Warner, J. M., Richard Keene, F. & Grant Collins, J., Jun 2016, In: Journal of Antimicrobial Chemotherapy. 71, 6, p. 1547-1555 9 p.

In Vivo delivery systems for therapeutic genome editing

Wang, L., Li, F., Dang, L., Liang, C., Wang, C., He, B., Liu, J., Li, D., Wu, X., Xu, X., Lyu, A. & Zhang, G., 27 Apr 2016, In: International Journal of Molecular Sciences. 17, 5, 19 p., 626.

Present advances and future perspectives of molecular targeted therapy for osteosarcoma

Shaikh, A. B., Li, F., Li, M., He, B., He, X., Chen, G., Guo, B., Li, D., Jiang, F., Dang, L., Zheng, S., Liang, C., Liu, J., Lu, C., Liu, B., Lu, J., Wang, L., Lyu, A. & Zhang, G., 6 Apr 2016, In: International Journal of Molecular Sciences. 17, 4, 21 p., 506.

Targeted delivery systems for molecular therapy in skeletal disorders

Dang, L., LIU, J., LI, F., Wang, L., LI, D., GUO, B., He, X., Jiang, F., Liang, C., Liu, B., Badshah, S. A., He, B., Lu, J., Lu, C., Lyu, A. & Zhang, G., 22 Mar 2016, In: International Journal of Molecular Sciences. 17, 3, 15 p., 428.

Dinuclear ruthenium(II) complexes containing one inert metal centre and one coordinatively-labile metal centre: Syntheses and biological activities

Li, X., Heimann, K., Li, F., Warner, J. M., Richard Keene, F. & Grant Collins, J., 7 Mar 2016, In: Dalton Transactions. 45, 9, p. 4017-4029 13 p.

Osteoclast-derived exosomal miR-214-3p inhibits osteoblastic bone formation

LI, D., LIU, J., GUO, B., LIANG, C., Dang, L., Lu, C., He, X., Cheung, H. Y. S., Xu, L., Lu, C., He, B., Liu, B., Shaikh, A. B., LI, F., Wang, L., YANG, Z., Au, D. W. T., Peng, S., Zhang, Z., Zhang, B. T., & 14 others Pan, X., Qian, A., Shang, P., Xiao, L., Jiang, B., WONG, C. K. C., Xu, J., BIAN, Z., Liang, Z., Guo, D. A., ZHU, H., Tan, W., LYU, A. & ZHANG, G., 7 Mar 2016, In: Nature Communications. 7, 10872.

Progress and challenges in developing aptamer-functionalized targeted drug delivery systems

Jiang, F., Liu, B., Lu, J., Li, F., Li, D., Liang, C., Dang, L., Liu, J., He, B., Badshah, S. A., Lu, C., He, X., Guo, B., Zhang, X. B., Tan, W., Lyu, A. & Zhang, G., 9 Oct 2015, In: International Journal of Molecular Sciences. 16, 10, p. 23784-23822 39 p.

Ruthenium complexes as antimicrobial agents

Li, F., Collins, J. G. & Richard Keene, F., 27 Feb 2015, In: Chemical Society Reviews. 8, p. 2529-2542 14 p., 44.

Dinuclear polypyridylruthenium(II) complexes: flow cytometry studies of their accumulation in bacteria and the effect on the bacterial membrane

Li, F., Feterl, M., Warner, J. M., Richard Keene, F. & Collins, J. G., 1 Dec 2013, In: Journal of Antimicrobial Chemotherapy. 68, 12, p. 2825-2833

Dinuclear ruthenium(II) antimicrobial agents that selectively target polysomes *in vivo*

Li, F., Harry, E. J., Bottomley, A. L., Edstein, M. D., Birrell, G. W., Woodward, C. E., Richard Keene, F. & Collins, J. G., 25 Nov 2013, In: Chemical Science. 5, 2, p. 685-693 9 p.

Iridium(III) Complexes containing 1,10-Phenanthroline and Derivatives – Synthetic, Stereochemical and Structural Studies, and their Antimicrobial Activity.

Pandrala, M., Li, F., Wallace, L., Steel, P. J., Moore II, B., Autschbach, J., Collins, J. G. & Richard Keene, F., Jul 2013, In: Australian Journal of Chemistry. 66, 9, p. 1065-1073 9 p.

Protein binding by dinuclear polypyridyl ruthenium(II) complexes and the effect of cucurbit[10]uril encapsulation.

Li, F., Feterl, M., Warner, J. M., Day, A. I., Richard Keene, F. & Collins, J. G., May 2013, In: Dalton Transactions. 42, 24, p. 8868-8877 10 p.

Chlorido-containing ruthenium(II) and iridium(III) complexes as antimicrobial agents

Pandrala, M., Li, F., Feterl, M., Mulyana, Y., Warner, J. M., Wallace, L., Richard Keene, F. & Collins, J. G., 29 Jan 2013, In: Dalton Transactions. 42, 13, p. 4686-4694 9 p.

***In vitro* susceptibility and cellular uptake for a new class of antimicrobial agents: dinuclear ruthenium(II) complexes**

Li, F., Feterl, M., Mulyana, Y., Warner, J. M., Collins, J. G. & Richard Keene, F., Aug 2012, In: Journal of Antimicrobial Chemotherapy. 67, 11, p. 2686-2695 10 p.

An approach to therapeutic agents through selective targeting of destabilised nucleic acid duplex sequences

Li, F., Weber, D. K., Morgan, J. L., Collins, J. G. & Richard Keene, F., Feb 2012, In: Dalton Transactions. 41, 21, p. 6528-6535 8 p.

The antimicrobial activity of inert oligonuclear polypyridylruthenium(II) complexes against pathogenic bacteria, including MRSA

Li, F., Mulyana, Y., Feterl, M., Warner, J. M., Collins, J. G. & Richard Keene, F., Mar 2011, In: Dalton Transactions. 40, 18, p. 5032-5038 7 p.

Activities

Experimental Cell Research (Journal)

Fangfei LI (Reviewer)
18 Jun 2024

International Journal of Molecular Sciences (Journal)

Fangfei LI (Reviewer)
19 Apr 2024

External Reviewer of University of Macau Multi-year Research Grant (General Research Grant)

Fangfei LI (Advisor)
16 Apr 2024 → 20 Apr 2024

Heliyon (Journal)

Fangfei LI (Reviewer)
16 Apr 2024

Frontiers in Immunology (Journal)

Fangfei LI (Associate editor)
2024 → ...

Frontiers in Oncology (Journal)

Fangfei LI (Associate editor)
2024 → ...

International Journal of Biological Sciences (Journal)

Fangfei LI (Reviewer)

2 Jun 2023

International Journal of Biological Sciences (Journal)

Fangfei LI (Reviewer)

23 May 2023

Hong Kong Traditional Chinese Medicine Pharmacology, Hong Kong Pharmacologists and Toxicologists Club, Hong Kong Science Park "University of Medicine Valley" Innovation Group Annual Conference (External organisation)

Fangfei LI (Chairman)

2022

Guangdong-Hong Kong Macao Greater Bay Area International Research Platform for Aptamer-Based Translational Medicine and Drug Discovery (External organisation)

Yuanyuan YU (Committee/panel/advisory board member), Aiping LYU (Director/non-executive director), Ge ZHANG (Director/non-executive director), Jin LIU (Working group member), Fangfei LI (Working group member) & Yuan MA (Working group member)

2017 → ...

Prizes

Second Prize in Life Sciences

LI, Fangfei (Recipient) & LIU, Jin (Recipient), 23 May 2017

The 8th Hong Kong University Student Innovation and Entrepreneurship Competition

LI, Fangfei (Recipient), 2022

Press/Media

《Biomaterials》：香港浸会大学为肿瘤基因疗法开发新靶向系统

Fangfei LI

13/11/17

1 Media contribution

明报JUMP采访：中医药创新现代化 AI技术不可缺 中药研究人员迎挑战与机遇

Fangfei LI

1/03/24

1 Media contribution

香港浸会大学张戈、吕爱平Nature子刊文章：特异性识别肿瘤的适配子-天然产物偶合物

Fangfei LI

9/11/17

1 Media contribution

Projects

Aptamer: Molecular Insight & Translational Therapeutics

LYU, A., ZHANG, G., REN, K., YU, Y., LIANG, C., LI, F. & LU, J.

1/01/21 → 31/12/25

Equipment Matching Fund - High-performance Slide Scanner

LIU, J., LI, F., YU, Y., XU, J., FU, X., WONG, H. L. X., KWAN, H. Y. & CHONG, W. P.

26/03/24 → 25/03/26

Osteosarcoma-specific delivery of CRISPR/Cas9 by aptamer-functionalized lipopolymer for therapeutic genome editing of VEGFA in a patient-derived xenograft model

LI, F.

1/01/19 → 31/12/22

核酸適配子功能化的脂質聚合物腫瘤靶向遞送CRISPR/Cas9用於基因編輯VEGFA治療骨肉瘤

LI, F.