

BIOGRAPHICAL SKETCH

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NAME: Rex Frimpong Anane

eRA COMMONS USER NAME (credential, e.g., agency login):

POSITION TITLE: PhD Candidate

EDUCATION/TRAINING *(Begin with baccalaureate or other initial professional education, such as nursing, include postdoctoral training and residency training if applicable. Add/delete rows as necessary.)*

INSTITUTION AND LOCATION	DEGREE (if applicable)	Completion Date MM/YYYY	FIELD OF STUDY
University of Cape Coast, Cape Coast, Central Region, Ghana	B.Sc.	05/2013	Human Biology
Yunnan Agricultural University, Kunming, Yunnan Province, China (MSc training)	M.Sc.	06/2019	Biochemistry and Molecular Biology
Monash University, Melbourne, VIC, Australia (PhD training)	PhD	05/2025	Biochemistry and Molecular Biology (Fibrinolytic proteins)

A. Personal Statement

I have the expertise, training, and motivation necessary to successfully take the TP1: Embedded Cross-training Program training at NCCAT. The TP1 program mission is to train a scientist to become an independent CryoEM researcher. My PhD research utilizes CryoEM to study the structural interaction between plasminogen and its receptors, which is critical to unravel their physiological implications and develop potential therapeutic strategies for treating plasmin-mediated diseases. I have the basic/beginner skills in CryoEM that can help me successfully take and complete the TP1 training.

B. Positions, Scientific Appointments, and Honors**Positions and Employment**

2012-2012	Medical Laboratory Scientist (Internship) at the Lister Hospital and Fertility Center, Accra, Greater Accra Region, Ghana
2013-2014	Teaching/Research Assistant at the Department of Biomedical Sciences, University of Cape Coast, Cape Coast, Central Region, Ghana
2014-2015	Medical Laboratory Scientist at the Samartex Hospital Laboratory, Samreboi, Western Region, Ghana
2022-2023	Teaching Associate at the School of Biomedical Sciences, FMNHS, Monash University, Melbourne, VIC, Australia
2022-present	eExam Supervisor at the OASIS, Monash University, Melbourne, VIC, Australia
2024-present	Assistant Lecturer (PhD Teaching Fellow) at the School of Biomedical Sciences, FMNHS, Monash University, Melbourne, VIC, Australia

Other Experience and Professional Memberships

- 2022 -2024 Secretary, NOTDRS (Dep't. of Biochemistry and Molecular Biology Research Students' Group), School Biomedical Sciences, FMNHS, Monash University
- 2024 Member, The Australian Microscopy & Microanalysis Society

I was a part of the organizing committee of the following scientific events:

- 2022 The Biomedicine Discovery Institute Symposium
- 2023 NOTDRS (Dep't. of Biochemistry and Molecular Biology Research Students' Group) Symposium

C. Contributions to Science

My PhD study focuses on fibrinolytic system – a natural blood clot degradation mechanism. Prior to commencing my PhD, my previous major focus of research was microbial genetics. I have contributed the following peer-reviewed publications:

- Al-Otaibi, N., Atieh Aminian J., **Anane, R.F.**, et al. (2022). Sample preparation in single particle cryo-EM: general discussion. *Faraday Discuss.*, 2022,240, 81-100. <https://doi.org/10.1039/D2FD90059A>
- Anane R.F.**, Lin C., Sun H., Zhao L., Liu Z., Mao Z.C. (2019). Complete Genome Sequence of *Agrobacterium* sp. ATCC 31749 and Insights into its Curdian Biosynthesis. ***Current Trends in Genetics and Microbiology***. 2019(1): 1-20. [Complete-Genome-Sequence-of-Agrobacterium-sp-ATCC-31749-and Insights into its Curdian-Biosynthesis \(grfpublishers.com\)](https://www.grfpublishers.com/Complete-Genome-Sequence-of-Agrobacterium-sp-ATCC-31749-and-Insights-into-its-Curdian-Biosynthesis)
- Anane R.F.**, Sun H.F., Zhao L.M., Wang L., Lin C., Mao Z.C. (2017). Improved curdian production with discarded bottom parts of Asparagus spear. ***Microbial Cell Factories*** 16, 59 (2017). <https://doi.org/10.1186/s12934-017-0671-3>
- Gao, F., **Anane, R.F.**, Liu, Z. et al. (2023). Complete genome sequence of a novel fusarivirus from the phytopathogenic fungus *Fusarium* sp. *Arch Virol* **168**, 248. <https://doi.org/10.1007/s00705-023-05872-w>
- Chu, B., **Anane, R.F.**, Li, S. et al. (2023). Complete genome sequence analysis of Valeriana jatamansi tymovirus 1: a novel member of the genus *Tymovirus* infecting *Valeriana jatamansi* Jones. *Arch Virol* **168**, 245. <https://doi.org/10.1007/s00705-023-05876-6>
- Li, S., **Anane, R.F.**, Chen, Z. et al. (2023). Complete genome sequence of a novel closterovirus isolated from *Dregea volubilis*. *Arch Virol* **168**, 154. <https://doi.org/10.1007/s00705-023-05775-w>
- Gao, L., **Anane, R.F.**, Chen, Z. et al. (2023). Complete genome sequence analysis of a novel citlodavirus isolated from the leaves of *Myrica rubra* in Yunnan. *Arch Virol* **168**, 139. <https://doi.org/10.1007/s00705-023-05762-1>
- Wang, Z., Song, X., **Anane, R.F.**, Chen, Z., Li, S., Wen, G., Cai, H., & Zhao, M. (2023). First report of Lily virus X infecting *Paris polyphylla* var. *yunnanensis* in Yunnan, China. *Plant Disease*. <https://doi.org/10.1094/PDIS-03-23-0552-PDN>
- Wang, Z., **Anane, R.F.**, Chen, Z. et al. (2022). Complete genome sequence analysis of Paris alphapartitivirus 1: a novel member of the genus *Alphapartitivirus* infecting *Paris polyphylla* var. *yunnanensis*. *Arch Virol* **167**, 2365–2370. <https://doi.org/10.1007/s00705-022-05531-6>
- Wang, Z., Song, X., **Anane, R.F.**, Chen, L., Chen, Z., Gao, L., Li, S., Wen, G., & Zhao, M. (2022). Detection of orthospoviruses in medicinal plants in China. *Journal of Phytopathology*, 00, 1– 6. <https://doi.org/10.1111/jph.13093>
- Chen, Z., Chen, L., **Anane, R.F.** et al. (2022). Complete genome sequence of a novel mitovirus detected in *Paris polyphylla* var. *yunnanensis*. *Arch Virol* **167**, 645–650. <https://doi.org/10.1007/s00705-021-05339-w>
- Zhao Mingfu, Chen Lu, Guo Jian-Wei, **Anane Rex Frimpong**, Wang Zhe, Chen Zeli, Gao Like, Wen Guosong. (2021). First Report of Capsicum chlorosis virus Infecting *Chromolaena odorata* L. in Yunnan, China. *Plant Disease*. 10.1094/PDIS-02-21-0341-PDN
- Chen, L., **Anane, R.F.**, Wang, Z. et al. (2021). Characterization of a novel *Tombusviridae* species isolated from *Paris polyphylla* var. *yunnanensis*. *Arch Virol* **166**, 3199–3205. <https://doi.org/10.1007/s00705-021-05191-y>
- Chen, Z., **Anane, R.F.**, Wang, Z. et al. (2021). Complete genome sequence analysis of a novel coguvirus isolated from *Paris polyphylla* var. *yunnanensis*. *Arch Virol* **166**, 2045–2050. <https://doi.org/10.1007/s00705-021-05087-x>
- Chen, Z., **Anane, R. F.**, Wang, Z., Yang, L., Chen, L., Wen, G., & Zhao, M. (2020). Complete genome sequence of a novel potyvirus isolated from *Polygonatum kingianum*. ***Archives of virology***, **165**, 2127–2131. 10.1007/s00705-020-04717-0. Advance online publication. <https://doi.org/10.1007/s00705-020-04717-0>

- Chen, L., **Anane, R. F.**, Wang, Z., Yang, L., Chen, Z., Wen, G., & Zhao, M. (2020). Whole-genome sequence analysis of paris virus 1: a novel member of the genus Potyvirus infecting *Paris polyphylla* var. yunnanensis. *Archives of virology*, 165(4), 985–988. <https://doi.org/10.1007/s00705-020-04560-3>
- Ameyaw, E.O., Kukuia, K.K.E., Boampong, J.N., Kyei, S., **Anane, R.F.**, Obese, E., Konja, D. (2014). Ethanollic Root Extract of *Jatropha curcas* L. relieves Hyperalgesia in Arthritis Model in Rats. *International Journal of Pharmacological Research*. 4(1):18-21. <https://ssjournals.com/index.php/ijpr/article/view/1246>
- Ameyaw E.O., Kukuia K.K.E., Boampong J.N., Thomford A.K., **Anane R.F.**, Tabiri I., Yaw A. (2014). Ethanollic Root Extract of *Jatropha curcas* L. Relieves Muscle Pain in Rats. *Research & Reviews: Journal of Pharmacology*. 4(2): 5-10.
<http://www.stmjournals.com/index.php?journal=RRJoP&page=article&op=view&path%5B%5D=4581>
- Chen Z.L., **Anane R.F.**, Yang L.Y., Yang Y.H., Chen L., Sun Y., Wen G.S., Zhao M.F. First Report of Apple stem grooving virus in Yunnan Huang Jing (*Polygonatum kingianum*) in China. *Plant Disease*, 2019, 103:7, 1803-1803. <https://doi.org/10.1094/PDIS-02-19-0414-PDN>
- Wen G.S., Yang L.Y., **Anane R.F.**, Chen Z.L., Yang Y.H., Chen L., Sun Y., Zhao M.F. (2019). First Report of Pepper mild mottle virus in Paris polyphylla var. yunnanensis in China. *Plant Disease*, 2019 103:12, 3289-3289. <https://doi.org/10.1094/PDIS-03-19-0445-PDN>
- Li M.J., Ke S.Y., Lin C., Mao Z.C., Liu Z.J., **Anane R.F.**, Zhao M.F., Wen G.S. (2017). First Report of Asparagus Virus 1 on Asparagus (*Asparagus officinalis* L) in China. *Plant Disease*. 2017 101:5, 844-844 <http://apsjournals.apsnet.org/doi/full/10.1094/PDIS-07-16-1075-PDN>

I have also contributed to a book chapter.

- Mireku-Gyimah Nana Ama, **Anane Rex Frimpong** & Hamenu Louis. (2021). Phytochemicals and Biogenic Metallic Nanoparticles as Anti-cancer Agents in Lung Cancer. <https://www.taylorfrancis.com/chapters/edit/10.1201/9781003046547-31/phytochemicals-biogenic-metallic-nanoparticles-anti-cancer-agents-lung-cancer-nana-ama-mireku-gyimah-rex-frimpong-anane-louis-hamenu>

Complete list of published work can be found in ResearchGate:

https://www.researchgate.net/profile/Rex_Anane