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### Development of in vitro Fluorescence Polarization Assay Characterizing the Interaction between Nipah Viral Proteins

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DEVELOPMENT OF *IN VITRO* FLUORESCENCE  
POLARIZATION ASSAY CHARACTERIZING THE  
INTERACTION BETWEEN NIPAH VIRAL PROTEINS

*Laura Hagenah*

*Mentors: Gaya Amarasinghe and Daisy Leung*

Nipah virus (NiV) is a highly pathogenic, zoonotic virus that currently has no drugs or vaccines available for treatment. Within the viral RNA-dependent RNA polymerase complex (viral RDRP complex) of NiV, the interaction between the nucleocapsid protein (N) and the polymerase cofactor (P) is essential for viral RNA synthesis. Due to the critical nature of this interaction, we are developing a fluorescence polarization assay (FPA) to characterize this protein-protein interaction, which can be used to screen for inhibitors that target the interface between the NiV N and P protein. These inhibitors could have the potential to be developed into antiviral treatments for NiV or other *Henipaviruses*.