Photon Reactions and Transport
Summary of Data Needs and Interests

- Photonuclear
  - Assess accuracy of current libraries
  - Improve cross section and emission data in energy ranges of interest
    - ~ MeV range photons
    - High energy photons for secondary effects on electronics protection

- Photoatomic
  - X-ray mass attenuation coefficients, atomic cross sections
    - Improving performance of X-ray and gamma ray analysis methods for safeguards

- Improve Simulation and Modelling Capabilities
  - Support advanced accelerator development
    - Isotope replacement, or new capabilities
  - Accurate and efficient methods for high-flux, high-attenuation, and/or complex environments
  - Evaluation of photonuclear simulation performance compared to operationally-relevant measurements