

## Radiation Damage in Macromolecular Crystallography: what metrics are useful ?

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**Vendredi 24 janvier 2020 – 10h00  
Amphithéâtre SOLEIL**

Over twenty years of research into the effects of radiation damage on protein structures both at room temperature and when held at cryo-temperatures has resulted in many interesting and useful observations [reviewed in 1-3] but has still not provided a full understanding of the reported phenomena.

In this talk I will attempt to summarise the current state of knowledge and highlight the challenges in developing robust metrics for characterising the rates of global and specific damage.

**References**

- [1] - J.M. Holton, *J. Synchrotron Radiation* **16**, 133–142 (2009)
- [2] - E.F. Garman, *Acta Cryst D* **66**, 339-351 (2010)
- [3] - E.F. Garman and M. Weik, Chapter 4 in 'Protein Crystallography: Challenges and Practical Solutions' Eds: Konstantinos Beis and Gwyndaf Evans, Published Royal Society of Chemistry. Pp 88-116 (2018)



Ce séminaire sera suivi d'une pause café

**Formalités d'entrée :** accès libre dans l'amphi du pavillon d'Accueil.

Si la manifestation a lieu dans le Grand Amphi SOLEIL du Bâtiment Central merci de vous munir d'une pièce d'identité (à échanger à l'accueil contre un badge d'accès)