photoaffinity labelling

**Acronym**: PAL

Technique by which a photochemically reactive molecular entity, specifically associated with a biomolecule, is photo-excited in order to covalently attach a label to the biomolecule, usually via intermediates. Identification of the resulting photo-crosslinked product provides structural information on the protein’s binding site.

**Notes:**
1. Technique widely used for identifying in general ligand-receptor interactions in biological macromolecules and in particular the binding site within proteins.
2. Typical examples are nitrenes, carbenes, ketone excited states, cations and radicals.

**Source:**
PAC, 2007, 79, 293 (Glossary of terms used in photochemistry, 3rd edition (IUPAC Recommendations 2006)) on page 383