

**Senior Computational Biology Research Engineer**

**Ref: 29238**

**Location: Wilton – Teesside/UK**

**Responsibilities**

* Provide sequence, structural and mechanistic insight into catalytic activity and function of enzymes to metabolic engineering team.
* Guide protein engineering strategies by interpreting catalytic variance, and using structure/function insights for the computational redesign of enzymes.
* Predict catalytic action by protein homology modelling and ligand docking.
* Integrate various resources (genomics, proteomics, literature) to aid the identification of novel enzymes for synthetic catalytic application.
* Liaise within a multi-disciplinary team of scientists, presenting, reviewing and appraising results.

**Requirements**

* PhD Bioinformatics, Biochemistry, Computational Chemistry, or a related field.
* Excellent analytical thinking skills and a solid foundation in general enzyme mechanisms, sequence and structural analysis.
* Expertise in applying bioinformatics tools for enzyme modeling and catalytic analysis (multiple sequence alignment, genomic context, structure and sequence homology, PyMOL/YASARA)
* Ability to work in a multidisciplinary environment, both independently and as part of a team setting.
* Molecular dynamics and protein/small molecule docking (AutoDock).
* Phylogenetics analysis
* Metabolic pathway exploration and tool development

**Closing Date: 16th January 2015**

Interested applicants should submit a detailed CV in English along with a covering letter indicating their salary expectations to [**humanresourceswilton@invista.com**](mailto:humanresourceswilton@invista.com)

**Please use the job title and reference code in your application.**

INVISTA seeks dynamic, high caliber scientists and engineers to join its rapidly expanding Wilton, U.K., research and development team to develop pioneering solutions to commercialise next-generation industrial biotechnology.

As part of INVISTA’s commitment to innovation, it has invested in the emerging field of industrial biotechnology, operating its own biotechnology capability out of the R&D lab in Wilton. INVISTA’s bio-scientists and engineers are working, alongside collaborators in academia and external technology companies, to develop new biotechnology processes and bring bio-derived products to market.

Through innovative research efforts at the leading edge of science, INVISTA has the potential to develop advantaged technologies that could significantly improve the cost and availability of several chemicals and raw materials that are used to produce its current products.

To work successfully in our team, candidates must be comfortable with a challenging fast paced environment where interdisciplinary team work is essential.

INVISTA is one of the world’s largest integrated producers of chemical intermediates, polymers and fibers with a portfolio of some of the world’s most recognizable brands and trademarks including LYCRA®, COOLMAX®, CORDURA®, STAINMASTER® and ANTRON®.

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