



SOLVAY PHARMACEUTICALS

RESEARCH & DEVELOPMENT

Post-doctoral Position (EU Marie Curie Industry Host Fellowships)

Identification of Marker Genes for Depression

PROJECT

Major depression is a severe illness that affects ~10% of the European adult population. The most recently accepted hypothesis to describe the biological state of major depression postulates a selective decrease in neuroplasticity, which can be prevented or even reversed by antidepressants. Depression occurs also with patients that recently suffered traumatic brain damage and is seen in conjunction with memory loss, confusion, headaches and balance problems. Using this mechanistic approach into neuroplasticity and depression, we want to focus at the genomic consequences of traumatic brain injury. Using microarrays, differential gene expression will be evaluated in terms of neuroplasticity, neural survival and the ability to reinnervate damaged tissue for functional recovery. In parallel, antidepressant drugs with known impact in neuronal survival will be evaluated similarly. Genes that emerge accordingly will need to be confirmed and made available in a state-of-the-art manner. This will be evaluated in time-course studies in animal tissue using in situ hybridization and immunocytochemistry. Over-expression of the gene and knock-down strategies using antisense or applying RNA-interference (RNA_i) treatment in cell lines and in organotypic tissue culture will help in assessing gene function. These data can be compared with those obtained from rat-based depression models. This multi-disciplinary approach, using mechanistic models for traumatic brain damage, impaired neuronal networks and depression is expected to yield novel targets on which innovative, genomics-based treatment can be designed.

COMPANY INFORMATION

Solvay Pharmaceuticals is a leading international pharmaceutical company dedicated to the discovery, development and manufacturing of human medicine. The company is part of the Solvay group, whose history dates back to 1863. The Pharmaceuticals sector operates globally in the fields of psychiatry, cardiology, gastro-enterology and gynaecology (see also www.solvaypharmaceuticals.com). The company ranks among the largest pharmaceutical companies with major research sites in The Netherlands and Germany. Around 400 people at the Weesp site in The Netherlands, in the immediate vicinity of Amsterdam, are directly involved in research into medicine for psychiatric disorders.

POSITION

This two-year post-doctoral fellowship provides an excellent opportunity to enter the dynamic field of drug discovery. You will be based at our research site in Weesp and work in a multi-disciplinary environment equipped with state-of-the-art facilities. You will profit from our extensive training and career development opportunities. In addition to the expertise within the company, we have many collaborations with academic laboratories and alliances with several biotechnology companies.

We are looking for a strong candidate with a recent Ph. D. degree and experience in neurobiology, molecular biology and/or cell biology. For general eligibility criteria, please visit the Marie Curie website at: http://www.cordis.lu/improving/fellowships/mcf_indhost_doct.htm. For further information, please contact Dr. Claudia Thaete (e-mail claudia.thaete@solvay.com). To apply, please send a letter + CV (including the names and contact details of at least two references) either by e-mail or regular mail to Solvay Pharmaceuticals, Target Discovery Unit, P.O. Box 900, 1380 DA Weesp, The Netherlands).