POSTDOCTORAL RESEARCHER IN BIOCOMPUTATION
at the Pennsylvania State University

NOTE: I am looking for a postdoc to start as soon as possible. If you have the background and are interested in this position, please send me email immediately so we can meet and discuss.

I seek a post PhD researcher, strong in biocomputation, interested and eager to focus computational, modeling and research efforts for 2 years in a highly interdisciplinary program of research and development related to the transport and dissolution of drug concentrations from clouds of particles within the gastro-intestinal tract and in vitro dissolution devices. The location of the research program will initially be the Pennsylvania State University in central Pennsylvania. The program combines these elements:

- Biocomputation (specifically, lattice-Boltzmann methods), algorithm development, high performance (parallel) computing.
- Mathematical modeling combined with in-depth scientific analysis of data derived both computationally and from in vivo and in vitro experiment.
- Basic fluid and transport dynamics.
- Basic pharmacological sciences and related pharmacokinetics.
- Gastro-intestinal mechanics, physiology and function.

It is important that the applicants have strong backgrounds and major experience in high performance computing and computational fluid dynamics and are strong in fundamental fluid dynamics. Other elements can be learned on the job.

This is a multi-year program funded by the FDA and in close collaboration with pharmaceutical scientists and a GI physician at the University of Michigan, and also in collaboration with pharmaceutical colleagues at AstraZeneca Sweden and other locations in Europe. This project is ideally suited to postdoctoral researchers who truly seek an opportunity to expand knowledge, abilities and contacts in interesting, and perhaps unusual, directions while maintaining contact with state-of-the-art computational and mechanical systems.

If you are interested, please contact and send a complete CV as soon as possible to:

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