Ph.D. student in nanomedicine

Kungliga Tekniska högskolan, KTH Kemivetenskap

KTH Royal Institute of Technology in Stockholm is the largest and oldest technical university in Sweden. No less than one-third of Sweden's technical research and engineering education capacity at university level is provided by KTH. Education and research spans from natural sciences to all branches of engineering and includes Architecture, Industrial Management and Urban Planning. There are a total of 12,400 full year students at first and second levels, almost 1,900 active (at least 50 per cent) research students and 5,100 employees.

KTH Chemical Science and Engineering includes the areas Chemistry, Chemical Engineering and Fibre and Polymer Technology. It encompasses both fundamental and applied Chemical sciences and seeks sustainable development through scientific excellence. Many research activities are interdisciplinary across the borders from Chemistry to Materials science, Environmental science, Biochemistry, Biology and Medicine. The School offers a Bachelor of Science in Engineering Chemistry, Degree Programs in Engineering Chemistry, Technical Preparatory Year and three international master programs: Chemical Engineering for Energy and the Environment, Macromolecular Materials and Molecular Science and Engineering. We also cooperate with the master programs Energy and Environment, Materials Design and Biotechnology.

Job Description

Research in our laboratory has a general focus on developing new conjugation chemistry that is general, efficient, can accommodate ligand diversity, maintain ligand bioaffinity, and give bioactive and stable interfaces. Project areas include new click-type chemistry, new antibiotic therapies, functional polymers, graphene chemistry, glyconanomaterials, mesoporous nanomaterials/polymer liposomes for drug delivery, and antimicrobial nanomaterials. The current position involves the development of molecular conjugates for the detection, imaging and therapeutic treatment of bacteria infections, especially drug-resistant bacteria. The project involves the synthesis of glycol-conjugates, fabrication and characterization of nanodrugs, and evaluation of their antimicrobial activities.

Qualifications

The candidate must have strong basic knowledge in chemistry, biochemistry or related fields, and have demonstrated abilities to conduct independent research as well as strong work ethics. The ideal candidate is an enthusiastic scientist with a master's degree in chemistry, biochemistry or related fields, and with strong skills in synthetic chemistry and drug delivery. Background in carbohydrate synthesis, cell culture assays, or molecular biology is a plus. Applicants must have high motivation for doctoral studies, strong work ethics, good communication skills, and ability to work independently in a team environment.

Trade union representatives

You'll find contact information to trade union representatives at
http://intra.kth.se/en/administration/rekrytering/annonsering/fackrepresentanter-1.500898.

Application

Log into KTH's recruitment system in order to apply to this position. You are the main responsible to ensure that your application is complete according to the ad. Your complete application must be received at KTH no later than the last day of application.

Others

We firmly decline all contact with staffing and recruitment agencies and job ad salespersons.

Type of employment	Time limited
Working hours	Full time
Number of positions	1
Working hours	100%
Reference	K-2015-0240
First day of employment	by agreement
Published	2015-12-10
City Stockholm	
Last application date	2016-1-31
County	Stockholms län
Country	Sweden
Contact	mingdi@kth.se

Link to ad: http://kth.mynetworkglobal.com/what:job/jobID:49269/