

Company Description

CIC nanoGUNE, Nanoscience Cooperative Research Center, located in Donostia-San Sebastián, Basque Country, is a research center set up with the mission to conduct excellent research in nanoscience and nanotechnology with the aim of increasing the Basque Country's business competitiveness and economic growth.

With the objective of placing the Basque Country at the forefront of nanoscience research, we have been successful in putting together a state-of-the-art infrastructure and incorporating highly-qualified researchers that have been making outstanding contributions in various fields of nanoscience and nanotechnology. We are also succeeding in transferring our knowledge into the market through the creation of new nanotechnology-based companies, and working directly with the industry in Research and Development projects.

Information

 **Deadline:** 2019-06-07
 **Category:** Academia
 **Province:** Gipuzkoa

 **Country:** Basque Country
 **City:** Donostia-San Sebastián

Company

CIC nanoGUNE



Main functions, requisites & benefits

Main functions

In the Nanomagnetism group, a 6 months Postdoctoral position is available from July 2019. This position is linked to the European FET project FEMTOTERABYTE "Spinoptical nanoantenna-assisted magnetic storage at few nanometers on femtosecond timescale" and will be dedicated to the design, and testing ultrafast acoustics in hybrid noble and ferromagnetic metals spinoptical-nanoantennas. Nanoplasmonics and magnetism have both undergone a rapid development in the past decade, enabling completely new research directions. Here we propose to combine the brand-new branch of nanoplasmonics – that of nanoscale spinoptics, providing extreme light confinement and the superior ability to manipulate photonic spin and orbital angular momenta, and nanomagnetism/molecular magnetism to establish a new fundamental way to control magnetism via light momenta spin-orbit mediated transfer of light momenta at the nanoscale in femtoseconds. To design and nanofabricate spin-nanoantennas and arrays of them To characterize their linear and non-linear optical and magneto-elastic and magneto-optical properties with spectroscopy, microscopy, and ultrafast optics

Requisites

For consideration, the candidate is expected to have a relevant engineering or science PhD degree. The ideal candidate will furthermore be skilled in optical measurement techniques and data analysis. The working language at nanoGUNE is English.

