



	Experiment title: Components of SRP	Experiment number: LS1492
Beamline: ID14-4	Date of experiment: ID14-4 27-2-99 – 1-3-99 ; from: 7.00 am to: 7.00 am	Date of report: 24 August 1999
Shifts: see below	Local contact(s): Anastassis Perrakis	<i>Received at ESRF:</i>
Names and affiliations of applicants (* indicates experimentalists): Luca Jovine*, Titia K. Sixma* Netherlands Cancer Institute, Amsterdam, The Netherlands		

Report:

**The time mentioned above has been shared with projects
LS1351(=LS1495)/LS1494(=LS1348)/LS1492/LS1491/**

The signal recognition particle (SRP) is a ribonucleoprotein complex essential for protein translocation across the periplasmic membrane in prokaryotes and the endoplasmic reticulum in eukaryotes. The evolutionary conserved “minimal” SRP consists of one ~50 kDa protein and one RNA molecule. We are studying the structure of components of the bacterial SRP.

A good native data set has been collected to 2.6 Angstrom of relatively speaking excellent quality and redundancy. Since the crystals are very anisotropic the data are in fact better than they seem from the statistics alone. The structure has since been solved using a Lutetium MAD data set collected elsewhere. The high resolution native data set will be used for structure refinement once the model has been built.