

# Current trends in Biomedicine

Role of RNA structures in the translation of viral and cellular RNAs

# 2008

# Workshops

Organized jointly by the

**un**  
**i** Universidad Internacional de Andalucía

and the



# A

## Scope

Post-transcriptional control of gene expression is a critical component of regulation within living organisms. This process can occur through a variety of different mechanisms including regulation of protein synthesis and the availability of mRNAs within the cell. These control mechanisms typically act on a subset of mRNAs that encode regulatory proteins needed to respond to specific signals. Understanding both the universal and the unique aspects of translation initiation control mechanisms are crucial objectives in modern molecular biology and recent years have witnessed enormous progress in this area. Key advances have been achieved in studies on important viruses. The genomes of certain positive strand RNA viruses, including hepatitis C virus (HCV) and picornaviruses (e.g. poliovirus), have unique properties. In particular, the initiation of protein synthesis has been shown to be dependent on complex RNA structures termed internal ribosome entry sites (IRESs) rather than a 5' terminal cap-structure. The viral IRES elements have also served as the paradigm for the identification of cellular IRESs. This workshop will bring together a variety of studies to clarify the mechanisms operating to achieve translational control in eukaryotic cells.

## Format of the Workshop

The workshop will bring together 17 speakers and a maximum of 50 participants (including speakers). The scientific programme will start in the morning of Monday, October 27, and will end around noon on Wednesday, October 29. Ample time for informal discussion will be reserved. Participants will be invited to present a poster.

## Venue of the Workshop

The workshop will be held in Baeza, at the "Sede Antonio Machado", a XVII century building turned into a Conference Centre of the Universidad Internacional de Andalucía (UNIA). This Seat includes a recently restored residence, where participants will be accommodated. Baeza is a World Historic Heritage town, renowned for its Renaissance and Gothic buildings.

## Organized by:

**Graham J. Belsham.** National Veterinary Institute, Technical University of Denmark. Lindholm, Denmark.

**Jordi Gómez.** Instituto de Parasitología y Biomedicina "López-Neyra", CSIC. Granada, Spain.

**Encarna Martínez-Salas.** Centro de Biología Molecular "Severo Ochoa", CSIC-UAM. Madrid, Spain.

## Speakers

**Graham J. Belsham.** National Veterinary Institute, Technical University of Denmark. Lindholm, Denmark.

**Ian Brierley.** Division of Virology, Department of Pathology, University of Cambridge. Cambridge, United Kingdom.

**Catherine Florentz.** Architecture et Réactivité de l'ARN, Université Louis Pasteur de Strasbourg, CNRS, IBMC. Strasbourg, France.

**Fátima Gebauer.** Centre de Regulació Genòmica (CRG-UPF), Gene Regulation Programme. Barcelona, Spain.

**Jordi Gómez.** Departamento de Biología Molecular, Instituto de Parasitología y Biomedicina "López-Neyra", CSIC. Granada, Spain.

**Matthias W. Hentze.** EMBL, European Molecular Biology Laboratory. Heidelberg, Germany.

**Martin Holcik.** Apoptosis Research Centre, Children's Hospital of Eastern Ontario Research Institute. Ottawa, ON, Canada.

**Peter J. Lukavsky.** MRC Laboratory of Molecular Biology. Cambridge, United Kingdom.

**Encarna Martínez-Salas.** Centro de Biología Molecular "Severo Ochoa", CSIC - UAM. Madrid, Spain.

**Jerry Pelletier.** Department of Biochemistry and McGill Cancer Centre, McGill University. Montreal, QC, Canada.

**Lisa O. Roberts.** Faculty of Health and Medical Sciences, University of Surrey. Guildford, United Kingdom.

**Ivan N. Shatsky.** Belozersky Institute of Physico-Chemical Biology, Moscow State University. Moscow, Russia.

**Nahum Sonenberg.** Department of Biochemistry and McGill Cancer Centre, McGill University. Montreal, QC, Canada.

**Jean-Jacques Toulmé.** INSERM U869 and Institut Européen de Chimie et Biologie, Université de Bordeaux. Bordeaux, France.

**Stéphan Vagner.** INSERM U563, Université Toulouse III Paul Sabatier. Toulouse, France.

**Eric Westhof.** Architecture et Réactivité de l'ARN, Université Louis Pasteur, Institut de Biologie Moléculaire et Cellulaire, CNRS. Strasbourg, France.

**Anne E. Willis.** Centre for Biomolecular Sciences, University of Nottingham. Nottingham, United Kingdom.

**Baeza, Spain**  
**27-29 October 2008**

**Deadline:**  
5 September 2008

**Venue:**  
Sede Antonio Machado  
Universidad Internacional de Andalucía  
Palacio de Jabalquinto  
Plaza de Santa Cruz, s/n.  
23440 Baeza (Jaén), Spain  
Tel: +34 953 74 27 75.  
Fax: +34 953 74 29 75.  
E-mail: baeza@unia.es

**Workshop coordinator:**  
Joaquín Torreblanca  
Universidad Internacional de Andalucía  
j.torreblanca@unia.es

**More information and application:**  
<http://www.unia.es/biomedicineworkshops/workshops2008.htm>

