

## **1. PREFACE / *Vorwort***

This annual report 2001 includes details of our international publications and presentations at international conferences as well as the details of personnel and financial structure of our Institute. In this last calendar year our scientific activity has been continuing to increase as well as our personnel.

The entire research field of “organic, plastic solar cells” has been expanding in nearly all European states as well as overseas. Our Institute’s role of pioneering and leading this field is well established and at the same time heavily challenged by very potent competitors worldwide. It is also especially interesting to note that Siemens AG, Germany’s leading electronic giant corporation, has decided to introduce the field of plastic solar cells into its Central Research in Erlangen, Germany. At this stage it is safe to say, that industrial application development of these type of solar cells is entering a new and advanced technological state. This is a critical state ! The institutions with practical innovations, introducing a special know how etc will have a critical edge in the race of these developments. A market introduction will strongly depend on these innovations and the one who makes the first market penetration will be benefiting. Our Institute’s role as the leading institution in this research & development (R&D) has been and will be decisively important, also in this new stage.

Our new labs consisting of glove box streets with prototype capability are installed and operational at the end of 2001. Within the context of the new stage of R & D as mentioned in the previous paragraph, these development labs are important utilities to create practical innovations and know-how.

On the other hand we are currently entering in our Institute a new field of organic/inorganic hybrid technology for bulk heterojunction solar cells. Nanocrystalline inorganic semiconductor synthesis as well as incorporation thereof into organic matrices not only opens up a new alternative approach, but also brings together the organic and inorganic semiconductor science & technology in a perfectly interdisciplinary way. I see great potential in this approach, since the advantages of inorganic and organic compounds can be combined in a clever way.

We want to acknowledge all the financial support we have received from the Linzer Hochschulfonds, Linzer City Government, Upper Austria Local Government, Fonds for Advancement of Science in Austria, Christian Doppler Society, Ministry of Education and Research in Federal Republic of Germany, Ministry of Economy of The Netherlands (EET) as well as the European Commission. Last but most important, all this could not be realized without the dedicated work of the members of our Group.

Linz, January 2002

Niyazi Serdar Sariciftci