# **TIFR Alumni Association**



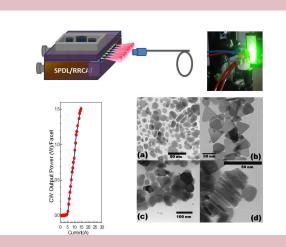
### **TAA Public Lecture**

## **Photonics- Science and Engineering**

# **Professor Kailash Rustagi**

### Abstract:

A new word Photonics was coined some 45 years ago for the techniques of doing with photons what electrons do in electronics. Such was the attraction of the word that it has now come to signify all applications of light including those in biology and chemistry. For about 15 years after the first successful operation of a laser many applications of lasers were explored and a few saw commercial success. With advances made in lasers, detectors and optical fibers, a whole new range of compact, efficient and mass produced devices became possible and photonics became a big industry growing rapidly. In this talk I will discuss the salient features of this story, physics ideas and their practical exploitation. I will end with speculation about the role of photons in quantum technology *i.e.* devices based explicitly on quantum principles.



29th February, 2016 at 4 p.m.



### **About the Speaker:**

During his scientific career since 1965 Dr. Kailash Rustagi was associated with TIFR, BARC, RRCAT, IIT Bombay and held visiting positions at several labs in France and Germany. His interests have spanned several aspects of applied and basic research in nonlinear optics, photonics and semiconductors. He was among the early contributors to linear and nonlinear optical properties of conjugated organic molecules, fullerenes and semiconductor quantum dots. At present he teaches at CBS. In the past, he has also served as the President, Indian Laser Association and President, TIFR Alumni Association.

Venue

Lecture Theatre (AG-66), TIFR, Mumbai

**Entry Free** 

**411** Are Welcome

Non TIFR members are requested to carry valid photo I.D. card

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