

# Raman joins the immortals

By V. K. NARASIMHAN

**SIR Chandrasekhar Venkata Raman** has joined the immortals.

I cannot say whether C. V. Raman believed in personal immortality or the immortality of the soul. Once when I asked him whether he believed in the Law of Karma, he replied that the problem did not interest him.

It may seem extraordinary that for a scientist so versatile as Raman the deeper problems of life and after-life had no interest. The reason may be that he was so profoundly absorbed in the scientific explorations that engaged his immediate attention that he did not have the inclination to go from physics to metaphysics.

In this respect he was in striking contrast to his one-time colleague and fellow-worker, Dr. K. S. Krishnan who was the first Director of the National Physical Laboratory. Though Dr. Krishnan was nearly as great a scientist as Sir C. V. Raman, his interest in his later years turned to philosophy. Few could descend on the Lyons of the Aiwars with the knowledge and intensity of feeling that Dr. Krishnan displayed.

## Unifying force

Raman was always proud to declare that science was his religion. In an interesting encounter with Gandhiji in 1936, Raman declared his credo as follows: "If there is God, we must look for Him in the universe. If He is not there, He is not worth looking for, I am being looked upon in various quarters as an atheist, but I am not. The growing discoveries in the science of astronomy and physics seem to me to be further and further revelation of God. Mahatmaji, religions cannot unite. Science offers the best opportunity for a complete fellowship. All men of science are brothers."

"What about the converse?" asked Gandhiji. "All who are not men of science are not brothers?"

Raman realised that Gandhiji had neatly turned the tables on him. He replied: "But all can become men of science."

Gandhiji remarked: "You will have to present a Karma of Science as Islam presents one."

## Karma yogi

Raman perhaps believed so much in the power of science to induce rational behaviour that he imagined science as holding the key to human unity. A disillusioned generation which has witnessed the

it is my earnest desire to bring into existence a centre of scientific research worthy of our ancient country where the keenest intellects of our land can probe into the mysteries of the Universe and by so doing help us to appreciate the transcendent Power that guides its activities. This aim can only be achieved if by His Divine Grace, all lovers of our country see their way to help the cause...

C. V. Raman

harnessing of science in the cause of national aggrandisement or ideological domination will not share Raman's touching faith in science.

There is obviously a higher Jnana which transcends the Vijnana of science. Men like Aurobindo, who were conscious of the great power of science to liberate humanity from subjection to its physical environment, also realised that humanity needed to be liberated from its selfishness, passions, desires and hatreds. The scientific quest is no substitute for the spiritual quest.

In a sense the true scientist is also a spiritual seeker, as C. V. Raman exemplified in his life. He pursued science with a devotion and an indifference to material rewards which endow his life with the quality of a karma yogi

## Glowing

Raman opened out new vistas of knowledge about light and sound, colour and music, about liquids and solids, which have earned him an enduring place in the annals of science.

He had an infectious enthusiasm for the problems in which he was interested. Once when I was at his Institute to make a respectful call on him, he was eagerly awaiting the arrival of some precious scientific equipment. His impatience reminded me of the eager anxiety with which a parent awaits the birth of a child.

Taking me into one of the rooms in which he had a collection of rocks, he announced that he was taking me into Ali Baba's cave. By switching on and switching off lights, I found pieces of rock, which had been dull and colourless earlier, glowing in many colours.

It was a delight to hear him talk about his work and his dis-

coveries. In a life crowded with scientific achievement spread over more than sixty years, Raman was continually exploring new areas, exploding old ideas and embarking on new investigations.

## Devotion

Dr. V. S. Subramaniam, a leading ENT specialist, once told me that after listening to a lecture by Sir C. V. Raman on how the ear functioned he felt how little he knew about the ear and how much remained to be known about the mystery of sound and the organ that makes it meaningful. He said he was amazed that a physicist should have explored the functions of the ear so thoroughly and revealed so much that was not known to medical men specialising in the subject.

Perhaps the greatest contribution of Raman to India is the large band of scientists who have learnt from him or worked with him. Raman was unhappy over the fact that despite the large number of national laboratories set up at great expense since Independence, the creative output of these laboratories was very little. Free India's outstanding original contributions to scientific knowledge, apart from the work of Raman and one or two others; have been negligible; Raman once remarked that our national laboratories have become mausoleums for scientific equipment.

Raman was an authentic genius; who had the courage and the will to pursue his scientific interests without worrying about his career or income. Great scientific work cannot perhaps be done without such transcendental devotion. That is the lesson of Raman's life and achievement for the younger scientists in the country.