

**Cortona-India Conference
Hyderabad
20 November 2010**

Dimensions of Spiritual Science

***"Philosophy is the greatest good which
the Gods have conferred upon men"***

I am indeed delighted to address and interact with the students and the distinguished guests present here. My greetings to all of you. I was reading about Cortona Conferences which were instituted to fill-up the gap university education lead in the dimension of spiritual learning and in synchronizing the heart, soul and mind, particularly in the youth. I am happy that one of the aims of these conferences is to create a new blend of "Better" Scientist who has holistic perception of the world in their understanding of the scientific world. I am also glad to know that the topic of this conference is ***Science and Spiritual Heritage of India***. This raises an important issue - how science and spirituality is related and what can they give to each other? With this theme, when I am in the midst of all of you, I would like to share my views on the topic "***Dimensions of Spiritual Science***".

Music and science in a Nobel Laureate's life

Let me share an experience of one the Indian Scientist's life. His love for music and research in musical instruments

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made him an expert in both acoustics and optics. Sir CV Raman won the Nobel Prize for 'Raman Effect'.

Born in Tiruchirapalli on November 7, 1888 Raman was a bright student right from the start. Apart from being fascinated by optical science, he was also deeply interested in acoustics. That perhaps tempted him to discover that the mridangam and tabla produced more melodious sounds than any other percussion instrument. He was fascinated by colourful things, be it a flower, butterfly or gem.

The ship sailed from the port of London towards Calcutta. On board was young man who had delivered lecture on the acoustics of violin, in London. He was now on the ship's deck gazing at the blue waters of the ocean. As he glanced up at the blue sky, a series of questions popped up in his mind. "Why are both the sea and the sky blue in colour? What is the science behind this occurrence? His mind revealed him the reason could be scattering of light by water molecules. His instinct told him the reason could be the prove it scientifically to be accepted by others.

When the ship anchored at Calcutta, the young man immediately went on to conduct experiments to prove his theory. His research in optics, the science of light, resulted in the discovery of the Raman Effect. He announced it to the scientific world on March 16, 1928. The discovery won him the

Nobel Prize for physics in 1930. It was the first time that this prize was awarded to an Asian! Even before this, his contribution to the science of optics had been acknowledged and he was elected Fellow of the Royal Society in 1924. You would have learnt about the 'Raman Effect' in detail. But do you know the discovery subsequently helped in determining the internal structures of some 2,000 chemical compounds? Can you guess, what was the cost of the equipment that Raman used to prove his theory? A meager two hundred rupees! The day he discovered the Raman Effect, February 28, is being celebrated as National Science Day, throughout the country.

Raman strongly felt that scientists should not be confined to laboratories in an effort to solve scientific problems. They should search around themselves and find those answers in accordance with nature. The essence of science was independent thinking and hard work and not equipment. How true! Though the oceans and the sky have always been blue in colour, it needed a questioning mind with a scientific outlook to find the reason behind it, and the indomitable spirit of Sir CV Raman.

Sir CV Raman's life can be a perfect example of integrated learning across multiple dimensions covering both art and science. The question is can our young minds develop

multi capacities, in art, music, spirituality and science. Then, a world full of beauty, peace and prosperity will blossom.

Purpose of Life

Friends, I would like share three incidents, which influenced me. First one is learning from the life of Imam Ghazali - the indomitable spirit and don't give way to flattery, which influenced me from young age. Second is, my meeting with a 103 years old Sage, radiating the message, "by giving, happiness blossoms" and the third incident is about the message of "nuclear weapon free world".

Human Indomitable spirit has a blessing of Almighty

Imam Ghazali was a saint teacher lived in the 12th Century. When I was young, my father narrated me a scene when Imam Ghazali was tested by Shaitan, the transgressed Angel. One day, Imam Ghazali was unfolding his prayer mat for Maharif Namaz. At that time, the Shaitan appeared in front of him and said, "Respected Imam Sahib, I am just now coming from heaven where there was a discussion about great human beings and you have been judged as the best human being living on Earth. As a recognition of your great stature you have been exempted from the trouble of performing Namaz in future. Imam Ghazali was restless as the Namaz time was

approaching. So he looked at Shaitan and said, "Shaitan Sahib, first of all performing Namaz is not a trouble at all and when even Prophet Mohammed (peace be upon him), was not exempted from performing Namaz five times a day, how can a poor Imam like me be exempted?. Thank you. He went on to perform the Namaz. When he completed the Namaz, Imam Ghazali still saw Shaitan was standing. Imam Sahib asked him what he was waiting for. Shaitan said, "O Imam you have excelled even the most favoured Prophet Adam, who could not win over my deception and I made him to eat the forbidden fruit. Realizing that Shaitan was flattering Imam Sahib prayed to Allah, Oh almighty, help me and save me from the deception of the flattery making a disappointed Shaitan finally disappear. His mission failed.

The message we derive from the story of Imam Ghazali is that, spirituality and religion should create and nurture indomitable spirit which is resilient to all temptation and corruption.

Traits of good human being

Last year, I participated in the 102nd Birthday celebrations of HH Dr. Sree Sree Sivakumara Mahaswamigalu at Siddaganga Math, Tumkur. His Holiness Sree Sree Sivakumara Swamiji is an example of spreading the message of "giving". He has been on a tireless mission of socio-

economic development and eradication of evils of illiteracy and discrimination through giving. He saw education and alleviation of hunger among the masses as an effective means to enrich human capacity which in turn would contribute to national reconstruction. His Holiness Swamiji has followed the footprints of his Guru of providing free boarding home to the students which is now serving the needs of over 8,000 students. In addition, 2000 pilgrims and visitors in the Math are also provided food every day. During the last seven decades Swamiji is the founder of well over hundred and twenty five educational institutions ranging from nursery to institutions of technology, pure science, arts, management, vocational training and performing arts.

At the end of his birthday function, Mahaswamigal gave an extempore speech for 15 minutes. Based on his century of experience, he says, for developing a happy and peaceful society, each citizen of the nation has to be facilitated to develop two unique traits. One is intellect and the other is humaneness. This can be acquired through good parentage, good teachers, good books and being in the company of great people. If this is not done at the right age, human being can become a shaitan particularly if the intellect acts without humaneness. We as a nation, have to take this message and develop our youth with these traits. The message we derive from the life of HH Dr. Sree Sree Sivakumara Mahaswamigalu is, by giving and giving, happiness blossoms in self, others and

the world. I composed a poem to celebrate the event, part of the poem, I would like to share with all you young friends,

Radiating message from Sree Siddaganga Math

You have everything to give.
If you have knowledge, share it.
If you have resources, share it with the needy.
Use your mind and heart,
To remove the pain of the suffering,
And, cheer the sad hearts.
In giving, you receive happiness.
Almighty will bless all your actions.”

Nuclear weapon free world is the mission of life

Now I would like to recall the times I spent with a revered saint who is an epitome of peace. My first experience with Acharya Mahapragya was at Adhyatma Sadhna Kendra, Mehrauli in Oct 1999 at around midnight. On that night, he prayed three times with his distinguished Jain monks for the welfare of the nation and the people. After the prayers, I still remember, he gave a divine message to me which still reverberates in my mind. He said, “Kalam, God bless you for what you have done with your team. God Almighty has a bigger mission for you and that is why you are here with me today. I

know our country is a nuclear nation now. The mission for you is greater than what you and your team have done, and it is greater than any human being had ever done. The nuclear weapons are proliferating in tens and thousands in the world. I command you and you only with all the divine blessings at my disposal to invent a 'peace system' and find a solution to make the same nuclear weapons ineffective, insignificant and politically inconsequential". When Acharyaji finished his great advice, there was a pin drop silence. It appeared to me as though the confluence of heavens concurred with the saintly message. This command shook me for the first time in my sixty eight years of life (now I am seventy nine). It has since then become a challenge working on me and has become a motto of my life.

Now, I would like to discuss about Divine Science.

Divine Science

Scientists, philosophers and theologians and Spiritual leaders have to eventually converge towards an understanding, what may be called divine science. The world is looking for a new science; that must be Divine Science. These are spiritual, mystical, religious and theological truths of the contemporary world. The Divine Science would be a result of breakthroughs in understanding the fundamental basis of reality such as quantum theory, relativity theory, chaos theory, general

systems theory, string theory, and others. The magnitude of infinite possibilities within the human body and external cosmos is amazing. The Divine Science has to transcend the certainty of strictly Newtonian clockwork notion to a new vision of a holistic and unified cosmos rooted in a non-local quantum reality that is fundamentally spiritual as opposed to material. It may also be described as intrinsically evolutionary and harmonious.

Let me now discuss about Righteousness, which will be the foundation for the evolution of enlightened citizenship.

Righteousness starts from your heart

Friends, despite all the advances made by humanity in technology, quality of living and virtually every field, there are day-to-day problems faced by individuals, families, nations and the world. Professional challenges can occupy one's concentration; caring for family can occupy the mind. Art, music and prayer can bring mental peace. However, how do we move towards a world of peace? What comes to my mind is a hymn which we often hear in our spiritual Centers:

Righteousness

Where there is righteousness in the heart,

There is beauty in the character.

When there is beauty in the character,

there is harmony in the home.

When there is harmony in the home.

There is an order in the nation.

When there is order in the nation,

There is peace in the world.

Now the question is how we inculcate the righteousness in the heart. In my opinion, there are three sources which can build a youth with righteousness in the heart. They are, mother and father in a spiritual environment and the third, most important is the teacher, particularly primary school teacher.

Now, I would like to discuss about how through a multipronged action the evolution of enlightened society can be realized in the global community.

Evolution of Enlightened Society

When nations join together to build a cohesive society, it is necessary to ensure that benefits of development encompass all sections of the society. World over, poverty, illiteracy, unemployment and deprivation are driving forward the forces of anger and violence. These forces link themselves to some earlier real or perceived historical enmities, tyrannies injustice, inequities, ethnic issues and religious fundamentalism flowing into an outburst of extremism worldwide. Nations have witnessed and are witnessing the

unsavory acts of certain misguided sections of society. We have to jointly address ourselves to the root causes of such phenomena for finding lasting solutions for promoting peace.

How do we evolve such cohesive spirit in the hearts of every citizen of the world leading to the evolution of enlightened society with righteousness in the heart?

I. Evolution of Enlightened Society

Dear friends, I would like to put forth to this important gathering, a methodology for evolving a happy, prosperous and peaceful society in our planet, which I call as "Evolution of Enlightened society". I have shared these thoughts with many intellectuals in national and international spheres. How do we create such an enlightened society, which will have three components (a) Education with value system (b) Religion transforming into spirituality and (c) Economic development for societal transformation? Let us discuss.

a. Education with value system: We have seen that the seeds of peace in the world have their origin in the righteousness in the heart of every individual. Such righteous citizens lead to the evolution of enlightened society. Education with value system has to be so designed that the righteousness in the heart is developed in young minds. That should be the mission of education. The prime learning

environment is five to seventeen years of age. This reminds me of an ancient Greek teacher's saying, ***"Give me a child for seven years; afterwards, let God or devil take the child. They cannot change the child"***. This indicates the power of great teachers and what they can inculcate in the young minds. Parents and teachers must inculcate moral leadership amongst children. It requires the ability to have insights into the uniqueness and universality of human consciousness. True education is the acquisition of enlightened feelings and enlightened powers to understand daily events and to understand the permanent truth linking man, to his environment, human and planetary.

Now, let me take up the area that is transforming religion into spiritual force. Many in the world believe, it is a difficult mission. I would like to share an experience that I have witnessed which has convinced me that it is possible.

b. Religion Transforming into Spirituality: Universal Mind: Religion has two components, theology and spirituality. Eventhough theology is unique to every religion, the spiritual component spreads the value to be inculcated by human beings for promoting a good human life and welfare of the society, while pursuing the material life. I would like to share an experience how the religion and science came together in a big mission.

It was during early 1960's, the founder of Indian Space Research Programme Prof. Vikram Sarabhai with his team, had located a place technically most suited for space research after considering many alternatives. The place called Thumba in Kerala, was selected for space research as it was near the magnetic equator, ideally suited for ionospheric and electrojet research in upper atmosphere. I was fortunate to work with Prof Vikram Sarabhai for about eight years.

The major challenge for Prof Vikram Sarabhai was to get the place in a specific area. As was normal, Prof. Vikram Sarabhai approached the Kerala Government administrators first. After seeing the profile of the land and the sea coast, the view expressed was that, thousands of fishing folks lived there, the place had an ancient St Mary Magdalene Church, Bishop's House and a school. Hence it would be very difficult to give this land and they were willing to provide land in an alternative area. Similarly, the political system also opined that it would be a difficult situation due to the existence of important institutions and the concern for people who were to be relocated. However there was a suggestion to approach the only person who could advise and help. That was the Bishop "Rev Father Peter Bernard Pereira". Prof Vikram Sarabhai, approached the Bishop on a Saturday evening, I still remember. The meeting between the two turned out to be historical. Many of us witnessed the event. Rev Father

exclaimed, "Oh Vikram, you are asking my children's abode, my abode and God's abode. How is it possible?" Both had a unique quality that they could smile even in difficult situations. Rev Father Peter Bernard Pereira asked Prof. Vikram Sarabhai to come to church on Sunday morning at 9.00 AM. Prof. Vikram Sarabhai went to the church again on Sunday with his team. At that time the prayer was progressing with the recitation of Bible by Father Pereira. After the prayer was over, the Bishop invited Prof. Vikram Sarabhai to come to the altar. The Rev Father introduced Prof Vikram Sarabhai to the congregation, "Dear children, here is a scientist, Prof. Vikram Sarabhai. What do sciences do? All of us experience, including this church, the light from electricity. I am able to talk to you through the mike which is made possible by technology. The treatment to patients by doctors comes from medical sciences. Science through technology enhances the comfort and quality of human life. What do I do, as a preacher? I pray for you, for your well being, for your peace. In short, what Vikram is doing and what I am doing, are the same - both science and spirituality seek the Almighty's blessings for human prosperity in body and mind. Dear Children, Prof Vikram says, he would build within a year, near the sea-coast, alternative facilities to what we are having. Now dear children, can we give our abode, can we give my abode, can we give the God's abode for a great scientific mission?" There was a total silence, a pin drop silence. Then

all of them got up and said '**Amen**' which made the whole church reverberate.

That was the church where we had our design centre, where we started rocket assembly and the Bishop's house was our scientists' working place. Later the Thumba Equatorial Rocket Launching Station (TERLS) led to the establishment of Vikram Sarabhai Space Centre (VSSC) and the space activities transformed into multiple space centers throughout the country. Now this church has become an important centre of learning, where thousands of people learn about the dynamic history of the space programme of India and the great minds of a scientist and spiritual leader. Of course, the Thumba citizens got the well equipped facilities, worshiping place and educational centre in an alternate place at the right time.

When I think of this event, I can see how enlightened spiritual and scientific leaders can converge towards giving reverence to the human life. Of course the birth of TERLS and then VSSC gave the country the capability for launch vehicles, spacecraft and space applications that have accelerated social and economic development in India to unprecedented levels.

Today, among us, Prof Vikram Sarabhai is not there, Rev Peter Bernard Pereira is not there, but those who are responsible for creation and making flowers blossom will themselves be a different kind of flower as described in the

Bhagwat Gita: "See the flower, how generously it distributes perfume and honey. It gives to all, gives freely of its love. When its work is done, it falls away quietly. Try to be like the flower, unassuming despite all its qualities". What a beautiful message, to the humanity on the purpose of life reflected the spiritual component. Can we bridge the spiritual component of the religions to bring peace to nations and to the world?

This instance, what I have narrated give me confidence that religions definitely can be bridged through spiritual components. Whenever I meet the young and experienced. I narrate these this experience. Many in India and world over may have such experiences. We have to spread such "**Glad Tidings**" to every part of the world.

Now let us discuss the third important component of enlightened society which is to achieve economic development for societal transformation.

c. Economic development for societal transformation:

Indian Economy is in an ascent phase. There is considerable growth in the manufacturing and service sectors. We have a mission of spreading this economic growth throughout the country including the rural sector. Nearly 280 million people have to be lifted by upgrading their quality of life in both rural and urban areas. Even though the GDP growth indicates our economic growth, people's participation is essential for achieving the required targets. It is essential to ensure that the

citizens are empowered with good quality of life encompassing nutritious food, good habitat, clean environment, affordable healthcare, quality education and productive employment, integrated with our value system drawn from civilizational heritage leading to the comprehensive development of the nation that will bring smiles in one billion people. These are indicators for the growth of the National Prosperity Index. To achieve that growth rate, we have identified five areas where India has a core competence for integrated action: (1) Agriculture and food processing (2) Education and Healthcare (3) Information and Communication Technology (4) Infrastructure development such as power, transportation, communication and including Providing Urban Amenities in Rural Areas (PURA) and (5) Self reliance in critical technologies. We propose to realize the vision of transforming India into a developed nation before 2020 by energizing and igniting the minds of all the 540 million youth of the nation.

So far we have discussed the three dimensional approach of providing value based education, religion transforming into spiritual force and economic development for societal transformation leading to the evolution of an enlightened society. This integrated three dimensional methodology of evolution of enlightened society will pave the way for peaceful, prosperous, happy nations and thereby a world, free from extremisms and further seeds of extremism.

Conclusion

Friends, in conclusion, I would like to recall a unique incident which gave me a message of unity of minds. During the year 2003, I visited one of the Indian states, Arunachal Pradesh, I visited a Buddhist monastery at Tawang, 3500 meters altitude. I stayed and spent some time, nearly for a day. I observed a unique situation in all the villages nearby where young and experienced were all radiating happiness in spite of severe winter environment. Then, I visited the 400 year old Tawang monastery where I saw monks of all age groups in a state of serenity. I was asking myself what is the unique feature of Tawang and surrounding villages which makes people and monks to be at peace with themselves. When the time came, I asked the Chief Monk, how in Tawang villages and monastery, I am experiencing peace and happiness being radiated by everyone. There was a pause, the chief monk smiled. He said, "You are the President of India. You will be knowing all about us and the whole nation. Again I said, "It is very important for me, you please give me your thoughtful analysis".

There was a beautiful golden image of Lord Buddha radiating smile and peace. The Chief Monk assembled nearby all his nearly 100 young and experienced monks. The Chief Monk and myself were sitting amidst them. The Chief Monk gave a short discourse, which I would like to share with you.

Chief Monk said, "In the present world, we have a problem of distrust, unhappiness transforming into violence. This monastery spreads: when you "Remove "I" and "Me" from your mind, you will eliminate ego; if you get rid of ego, hatred towards fellow human beings will vanish; if the hatred goes out of our mind, the violence in thinking and action will disappear; if violence in our mind is taken away, peace springs in human minds. Then peace and peace and peace alone will blossom in the society". I realized the meaning of beautiful equation for peaceful life, but difficult mission for the individual is how to remove the ethos of "I" and "ME". For this, we need the education inculcated in the young age as propagated by the great philosophers. The message we derive out of this experience is the need to rise above ego and negative thoughts, and transform them into positive thoughts of compassion for all humanity. This is the key for a happy, peaceful and prosperous society.

My best wishes to all the participants of Cortona India Conference, success in their missions.

May God Bless you.