

## A Talk on Seismic Attributes by Mr. Satinder Chopra at Mumbai Chapter

SPG Mumbai chapter organized a talk on “**Seismic Attributes adding value to 3D Seismic Interpretation**” by Mr. Satinder Chopra on 5<sup>th</sup> March, 2013. Mr. Chopra, an Ex-ONGCian is Chief Geophysicist (Reservoir) with Arcis Corporation, Calgary, Canada. In the last 27 years, he has worked in regular seismic processing and interactive interpretation, special processing of seismic data involving seismic attributes including coherence, curvature and texture attributes, seismic inversion, AVO, VSP processing and frequency enhancement of seismic data.

It was great opportunity for the members of the society to interact with Mr. Chopra who along with Mr. Kurt J. Murfurt have spent more time in developing the curvature attributes. Since these are second-order derivatives, seismic curvature attributes can enhance subtle information that may be difficult to see using first-order derivatives such as the dip magnitude and the dip-azimuth attributes. As a result, these attributes form an integral part of most seismic interpretation projects and add substantial values to interpretation with little extra effort (time and cost).

In his talk he stressed upon that curvature attributes measurement requires foot print free/minimized data. He further elaborated the methods for foot print removal techniques. The 5D interpolation technique which involves azimuth and time for interpolation of traces is the best solution. The other methods like Kx-Ky filtering in time domain helps in minimizing foot prints to great extent. The median filtering application is to be taken with pinch of salt, which may have implication on seismic amplitudes. The structure oriented filtering may give optimal results. His lecture included many case studies and example from Africa and Middle East. The talk generated lot of interest in the members and interaction session stretched beyond schedule time. In reply to a question about the role of shear waves in understanding reservoirs by Shri G C Katiyar, he insisted that the P-wave should be explored in fullest extent with all available attributes which many times resolve different problems including fracture orientation. In case of any further details are required then one should go for shear wave exploration , whose nature is not fully understood till date.



Shri GC Katiyar welcoming Mr Satinder Chopra with Bouquet of flowers and Mr. Satinder Chopra delivering the lecture

## **SPG Dehradun Organises two talks by Sri SatinderChopra**

SPG Dehradun organized a lecture by eminent geoscientists Sri Satinder Chopra, on 12-03-13 at Mini Auditorium of KDMIPE, ONGC Dehradun.

Mr. Satinder Chopra, who is one of the founder member of SPG, despite so much of name and fame SPG is still close to his heart which is evident from the fact that when President SPG-India Sri S.K.Das, requested him to deliver a talk during his recent visit to India, he happily agreed to deliver two talks.

His first talk "**Follow your creative ideas with passion**" was based on historical facts during the development of science and was philosophical in nature to inspire young geoscientists to have passion to pursue their ideas.

The topic of his second talk was "**Seismic attributes adding value to 3D seismic interpretation**"- a subject for which he has made his niche in international arena. Various seismic attributes and their application were discussed in details. The lecture was followed by an interactive session .

Sri C M Vardarajan, Vice President SPG-India, entire SPG executive body and a large number of young and experienced SPGians attended the talks.



Secretary SPG, Sri N S Dangwal proposed vote of thanks and Joint Secretary SPG Sri C B Yadava anchored the program.

## SPG, Vadodara Chapter organized a lecture by Prof S Ganapati on 15<sup>th</sup> March, 2013

SPG, Vadodara chapter organized a talk by eminent academician Prof S Ganapati , professor of geology in the MSU of Baroda on “Deep water Deposits-Processes and Facies” on 15<sup>th</sup> March, 2013. Prof Ganapati is a well-known name in the field of geology.

He deliberated on the scope for deep water exploration, its huge potential ranging from few centimetres to million cubic meters, the entire fan and what are different deep water processes and historical developments. How lithofacies get assembled in deep water? What are different depositional elements and facies associated with those elements. How slope channels are formed and their importance. He also brought out the fact that no single model could explain all the facies in the complex deep water environments. The major role is played by gravity and the grain size, the shelf and deep water physiography with turbidity currents controlling these processes.

He emphasized that deep water silicic-clastic systems have significant proportion of world’s hydrocarbon reservoirs. Understanding the variability of these systems, helps in predicting reservoir, trap and seal combinations. In turn, in driving exploration and development strategy in frontier & mature hydrocarbon provinces.



Prof Ganapati being welcomed by Mr A V Sathe, President, SPG, Vadodara Chapter

Audience during the presentation



Interactive moments with the audience

Mr. R K Khanna, presenting a memento to Prof. Ganapati