

# SANKHYA: AN ANCIENT PHILOSOPHY UNIFIES SCIENCE AND RELIGION.

*Vedic philosophy unifies the two contentious concepts of materiality and spirituality by demonstrating through precise mathematics that all manifestation is a hologram or the very embodiment of spirituality.*

The Vedas have roused man's curiosity around the globe at one stage or another. Just to know that so many intellectuals dedicated themselves to unravelling its meaning, is a tribute in itself, even though they failed to agree as to what the ancient creations really meant. Some extolled its virtues and praised it to the skies. While others weary from wresting a meaning, condemned it to the dungeons of despair. Are the Vedas an esoteric creation and if so who composed it in ancient times? Thereby hangs a historic tale of an intellectual colossus, who mathematically solved the riddle of manifestation aeons ago.

One is immediately prompted to raise the question 'why was it's real meaning not exposed in all this time'? Some modern intellectuals attempting the translations misjudged its scientific content for one thing. An erroneous 6000-year guesstimate of its origin prevented researchers from suspecting a possible difference in meaning of words from an older form of Sanskrit. For instance in current Sanskrit the term *Dukh:* means 'pain' but in the older version it is 'stress' as a technical term. A not so widely known fact was that Vedic authors of oral creations depended on the natural process of 'experiencing' real information as an ideal way to understanding phenomenon. Today animated graphic techniques make it easy to communicate the most complex ideas. In Vedic times too, the same principle was used to produce a dynamic imagery through a precisely formulated oral system. The verses contained six types of controls as rhyme rhythm, tone, inflection, emphasis and onomatopoeic meaning. Applying these factors to each set of verse 'simultaneously' through the learnt 'meditative Siddhi technique' created a real experience in the mind. The Dharma Mega Samadhi state helped to understand the meaning the author tried to convey. This process established an unequivocal understanding of the author's purpose in creating the verses. The Pratisakhya, also in a similar metric form as an adjunct to each Veda, aided it. The fact that the original authors saw the need for a supplement to aid comprehension provided an important clue to Vedic profoundness.

The foregoing is an important reason why the 'non-meditative' translations of the postglacial re-written manuscripts invariably yielded utter gibberish. Most translations failed because the researchers made the serious error of splitting up sets that destroyed a verse's contextual meaning in a Siddhi process. Few had that patience, except perhaps Swami Vivekananda, Sri Aurobindo, Lokmanya Tilak and Jagadguru Bharathi Krishna Thirtha among others. They took the difficult route of going through the original versions. The Lokmanya and the Jagadguru investigated, hypothesised and had the courage to write about it. Recent research indicated that Vedas contained a very advanced axiomatic theory of a Universe. It functioned on a holographic basis or through the concept of Maya which was misconstrued as an illusion. Such an advanced concept unequivocally unified the controversial 'material / spiritual' divide through

axiomatic mathematics. Even today, Physics and Cosmology are strangers to the holographic concept as applied to the Universe. Probably scientific translators too would have had to wait for the research environment to catch up with such ideas.

The present writer crossed the barrier of disbelief due to a fortunate set of events. Decoding the very first Sloka of the Rigveda, correctly, yielded a novel 'energy extraction principle'. It led to inventing an unusual electric motor that violated known electromagnetic principles (see details presented below). Similarly, the first Sloka of the Atharvaveda yielded, by decoding correctly, a profound energy principle. It led to the fundamentals of quantum physics and the very foundation for a holographic phenomenon. It gave a decisive clue to the source of coherent energy in space. Tests carried out with an invented device (currently under improvement) confirmed that concept. Was it a coincidence that the very first verse in the Rigveda and the Atharvaveda defined the very first fundamental principle in electromagnetic and quantum theory? These experiences led to decoding ancient man's greatest and ultimate scientific achievement in the Vedas. That process found the ancient man turned out to be the teacher for mankind!

### **Science of the rational.**

The reality of the Universe is an axiomatic fact. Yet, a human-centric intellectual would not let it pass without a challenge. His argument would probably emphasise the duality seen in every aspect of human existence. Hence, he would postulate the need for an observer to confirm the existence of the observed. The implication being that in the absence of an observer the Universe just 'disappears'. This conceptual hyperbole exists at the very altars of our scientific temple. Both the 'concepts of particle-wave duality' and 'principle of uncertainty' were self-explanatory anomalistic principles that existed in Theoretical Physics (Physics). Then there were the enigmatic quantum fluctuations in a supposedly empty and vacuous space. The theory of Special Relativity (SR) exposed space-time contractions involving shrinking rods & slowing clocks which seemed to defy common sense perceptions. The unexpected failure of the Michelson Morley experiments to detect the medium for propagation of light in space spurred many of these principles into existence. The reason behind the plethora of unusual scientific principles is just one simple fact.

A measurement is an interactive process that takes time. Until the interaction is complete or the measuring cup is full, the observer cannot complete the act of measurement. This fact applies to observers of both the human and instrumented kind. The latter is merely a sophisticated extension of our sensory processes. Even the very act of observing the Universe is a process of measurement. The perplexing point here is when does the observer know the interaction called measurement is actually completed? So the observer invents a clock that shows an interval he arbitrarily calls a second. Then he moronically compares all measurements in terms of this holy second. The result was as expected, uncertainty. Imagine a blind man filling a measuring cup for a second when it actually needed just one tenth of a second. The scientific researcher had been doing just what the blind man did, overlooking the nine cups that overflowed. The natural consequence of such a process was somewhere down the line the measurements refused to tally, despite established standards of accuracy, in a catchword called dimensionality, that did not match up to the real Universe. Was there a way to tally this huge loss? The perfect answer comes from unbelievable quarters, for it transcends the history of modern man.

The desire for fame, wealth and the consequent pressure, from the fiercely competitive world of national finance, compounded by the invisible world of scientific peerdom, drove researchers to establish credible avenues of escape from unresolvable errors. The process of redemption was to dilute every serious and irreconcilable error through a profound principle. It is unbelievable but true that every profound principle in Physics and Cosmology, gloss over areas ridden with hidden problems that defies human understanding. After the Newtonian magnum opus on Gravitation in the 17<sup>th</sup> century, the twin theory of General and Special Relativity (GR and SR) offered the key to resolving the manifestation process.

Unfortunately, it opened the doors to a nest of Pandora's box-of-anomalies. Its prime anomaly, the perpetual 'equality of gravitational and inertial mass', was quickly laid to rest by propounding the Principle of Equivalence. The next major anomaly, was the necessity to find one of the nine lost cups, called the Cosmological constant. It was needed to balance the complex GR equations. Before long, another unresolvable anomaly turned up accidentally, which bailed out the GR theorems. Hubble, an astronomer, discovered an anomalous and enigmatic behaviour in the expected result of spectral measurements. It was in regions where, man the observer, could never physically verify. The rate of measurements, through his extended eye the telescope, seemed to get slower and slower as man peered future and further into the Cosmos.

Hubble 'theorised' that could happen only if the Universe was expanding, like a rubber balloon. Einstein immediately saw the avenue of escape to hide the missing cup in his GR conundrum. From it evolved the grossest theory of the Big Bang expanding Universe. Kind nature did not comply, for instead of hiding at least that one-cup to mollify the GR inadequacy, it sprang a surprise of an equally gross order. Other researchers from the cosmic bench went on a search, for there was a tremendous shortage of the basic stuff, the so-called dark matter in empty space. And GR needed it immediately to ward off the collapse of a theory that predicted the ultimate cosmic collapse in the Big Bang. Something very mysterious was happening. For the equations, that had not even spotted the missing nine cups, cried out for just one more cup. While Hubble ostensibly provided it just in time to support the expansion, the cosmologists were calculating the number (running into billions) of cups, needed to start the contraction. A fundamental question arose in the minds of the fraternity. Was the Universe really expanding and then whereto? If not, into what will it contract? And as the questions increased, science kept discovering more phenomena, which promised to decrease them, through a paradigm called unification.

Moving to the seat of action, space, where the treasure-chest containing the perfect answer hid, researchers found a revolution taking place, in thinking 'small'. In the early 1900's a series of anomalies cropped up that defied common-sense solutions. Stating it in lay language experiments on transmission of energy showed that the quantity and volume increased proportionately. While Hubble had the advantage of peering through an eyepiece to detect the distance related rate anomaly; the energy experimenters had the disadvantage of conducting only indirect measurements. For the physical parameters of energy-interactions were in the micro-dimensional region. In a bid to find the limits of the energy radiation spectrum, ingenious procedures were used to find the answers. But the nemesis called contradiction turned up again! Contrary to expectations, instead of increasing proportionately, it collapsed at the highest energy level. It took the world of Physics by surprise. Not having found a solution, researchers named it the Boltzman paradox and the Ultraviolet catastrophe in deep space.

Later, Max Planck conjectured through complex mathematics that as energy was always being transmitted in packets, cups or quanta, the observed characteristics were to be expected. Thus Quantum Physics was born but another serious anomaly was making the process of measurement uncertain. Scientists found they could not verify the position while measuring the velocity of a particle. Next, when it was located, they could not measure its rate of motion simultaneously. This quandary had to be resolved quickly for the scientists were unsure as to where to search for the elusive particle or quantum. So they propounded, under compelling circumstances, the Principle of Uncertainty. It stated emphatically that a particle's 'position and movement cannot be measured simultaneously'. We are now squarely back to the starting point of our dialogue when it only implied that the Universe disappeared without an observer. Heisenburg's principle of uncertainty had now certified it as being correct and the scientific community had no way out of this dilemma.

Was it possible that in this solid and real looking Universe an observer could not detect something? Scientists did some serious introspection. Armed with a further string of fringe experiments under various names, showed that the particle or quantum disappeared only for a moment. Though it was impossible to confirm the location, it could be guessed with a tool called quantum statistics. By now, the scientific fraternity had travelled the intellectual road of profound principles that started with the desire to be accurate and specific. But it had to be content with uncertainty and probability as key principles in

Physics. Though credibility was at stake scientist refused to look for answers outside the laboratory environment. The reason was simple. Once it opened its doors to external principles, the logical continuity could become suspect and internal test for consistency broken. While theoretical science faced all the above intellectual hurdles, experimental science flourished, because a trial and error process led to concrete, usable results of some acceptable order. It was welcome, as in such a process one could not establish a theoretical goal initially. In this background, one can realise that acceptance of any alternate theory, however perfect, would meet with stiff resistance from the scientific community. For right now, all hopes are pinned on a theory based on 'super-symmetry' of 'super-strings'. What scientists were not aware of, the very source for all such theories was already lying hidden in a strange corner and defined in a stranger language.

### **Science of the irrational**

So far, one side of the coin, the rational observer from a protected elite, was analysed and conclusions arrived at. It left the state of scientific enquiry, into the fundamental cause of Universal phenomenon, in intellectual limbo. The other side of this coin entailed a research process more complex and confusing, called holistic perception. Like in science it was also a measuring process but of a different order. This investigative area was very large indeed. It had under its ken the entire range of phenomenon that rational scientists would not deign to touch. The identifiable spectrum covered telepathy, clairvoyance, and psychokinetic phenomenon, under the umbrella of a pseudoscientific term called ESP or extra sensory perception. Then of course there was astrology; palmistry, numerology, iching and more, cleverly disguised through an ambivalent description like Oriental studies. It further extended to sensitive areas of unusual acts through divine intervention called miracles and manifestations. That had the silent and ambiguous approval of the respective religious pontiffs who automatically put a no-entry sign to an outside investigation. There were numerous fringe-events witnessed and confirmed by the lay public, like 'bleeding pictures' and 'milk-drinking idols'. Again, there were other events of oracular donkeys braying 'in' good fortune and mischievous poltergeist children breaking the neighbour's roof. Shamanistic performers exorcised ghosts and rural seers detected thieves through an oily betel leaf. Nimble fortune-tellers using seeds, sticks and shells divined the future while mystics made profound predictions from observing lizards, insects and birds. Voodoo, witchcraft, blackmagic and the list of possible ways to perceive holistically grew without bound.

What is more thought provoking is the fact that while the multitudes swore by these experiences, the stoic silence with which the scientific fraternity greeted such news was indeed astounding. It looked almost like they were from another planet where laboratory experimentation and complex mathematics ruled every inch of the way. Science stands for objective curiosity itself and yet scientists failed to display this basic trait towards an enigmatic area. Even plain curiosity could have paid significant dividends by discovering esoteric principles underlying such phenomenon. And no one can deny that phenomenon it is.

Early European society had geared itself to tackle science on an organised footing from a few hundred years back. Europeans considered this area to be their domain and preserve. Experimental inventiveness based on the need to survive a hostile environment paid rich dividends in numerous ways and automatically established the proprietary status for its developments and products. The tropical and Eastern societies, on the other hand, continued with systems developed over long years of experience in surviving a more benign environment that was relatively stress free. The axiomatic Coriolis force endowed the tropical regions with the bounties of nature. It renewed, revived and recycled the environment in perfect harmony with nature's complex growth cycles. When nature itself played a decisive role in guiding their destinies into a state of effortless fulfilment it was no surprise that the incumbents in turn looked at natural phenomenon with wonder and reverence. That ultimately turned into divine worship. Their passive outlook and reverential attitude towards nature as an arbiter of natural and benevolent law gave them faith, courage and patience. They learned to await the cyclic changes with equanimity and optimism. Tropical inhabitants, world wide, type cast themselves into a mould of nature worshipers. They bent

themselves to its will with utter submission. This was in stark contrast to the early European group who bent nature's forces to their will in a bid to survive the rigours of that location. A calamitous double fault in the precessional equinoctial-cycle had driven these settlers into this location. They overcame that calamity by innovative skill and a self-developed aggressive outlook. That gave them the experience to lead the world in the art of subjugating nature's forces. This very calamity yields the key to the diverse history of modern man on this planet. Plus the fact that a previous era had produced an intellectual solution to the puzzle of manifestation.

Nature's devotees in the tropics had already established the school for holistic investigation into natural phenomenon. It included the Mayas, Incas, Mexicans, Amerindians, Egyptians, Africans, Indians, Chinese, inhabitants of the Malaysian, Indonesian, Southsea island archipelagos, in short the dwellers of the tropics. They had diverse experience in the practice of the occult, mystic, magical, spiritual and a range of holistic practices in perceiving and understanding phenomenon. Unlike the scientific fraternity, this area functioned through a heterogeneous sprinkling of practitioners without a common platform of theory or principle. Most of their information, handed down from one generation to the next, made the process a subjective real-time affair. This group considered the observer and the observed were one, which eliminated the concept of measurement and its consequential collateral damage. It was recognised as a time evolved or axiomatic principle that the Universe was a real, experiencable, singular entity. So any artefact of mental or physical derivations could not separate out the observer from the observed. While the reality of the Universe as a factual entity was never in doubt, these investigators never attempted to establish a credible communication system. Such investigators experienced a feeling of certainty that prevented them questioning the acceptability of pedagogical descriptions and verbal definitions of complex events at face value. The possibility of variations in the choice of words and the structure of sentences in a pedagogical communication conveyed an air of inherent fuzziness. It made it difficult to extract the correct meaning. The consequence of this increasing gap in communication, not only marginalised them as a group from the scientific fraternity but split them further into smaller groups that battled among themselves for recognition. These investigators had unwittingly strangulated themselves with their own lack of communication principles. A few modern holistic investigators had attempted to establish a laboratory model infrastructure but the outcome had not found acceptance in the scientific fraternity. The laboratory type of observer / instrument/ observed type of divide could not be introduced into holistic research where the researcher himself was the laboratory and his senses the instrument for observing himself. However in recent years Dr. Puharich, a dedicated researcher into psychic phenomena, spent almost a decade investigating Uri Gellers' psychokinetic acts. He observed Geller's performance under the supervision of Stanford Research Institute in the US, to establish scientific credibility. Despite confirmation of extraordinary psychokinetic acts, conducted under strict scientific supervision, there has been no reaction, except stony silence, from the ivory tower of Physics.

### **The Cataclysm in the Vedas and its origin.**

India, due to an historical advantage, took the lead in investigating holistic phenomenon. It included spiritual and yogic practices handed down ages ago from which it established a theoretical paradigm, based on disprovable axioms. While Physics had resorted to the unification paradigm to extricate itself from the intellectual mire of empirical science, the Indians based their thoughts on axiomatic principles that had the quality of unification built into it. These axiomatic, holistic principles formulated aeons ago, for all humanity, were the Vedas in Sanskrit. These were a sublime creation, not because it was from any divine source as the nature-devotees in the tropics naturally liked to claim, but its logical structure was immaculate, consistent and self proving, as it was based on numerical axioms. The concept of a divine origin for the Vedas had in support a number of circumstantial events that lead to this conjecture. The logical sequence of events leading to the needed background was cogently hypothesised through relevant mathematical adjuncts, by Lokmanya Tilak. He published the results of his meticulous research in his two classical books "The Orion" and "The Arctic Home in the Vedas". In it he

hypothesised that a Vedic civilisations existed prior to the Glacial floods in the Arctic region. It had an equitable climate then due to certain precessional deviations in the planetary orbital cycles. Stating a truism, the historical memory of ancient events lingers in direct proportion to the calamitous level of collateral damage it invokes. One such event exists in all the profound writings and historical pronouncements of nations, countries, races, religious and ethnic groups of people, the unforgettable flood.

The glacial floods virtually destroyed all signs of human achievements or progress in the previous era. It left in its aftermath no relic of any importance that could have provided a handle of connectivity with civilisations that must have existed earlier. However, there is some confirmation through recent media reports of archaeological findings containing 40000-year-old human artefacts and implements in the Arctic Circle. Scientific corroboration of the glacial-melt causing the floods have been well established and documented to erase any doubts about its veracity. The glacial catastrophe occurred more than 10000 years ago. The survivors were certainly not the first-line of Homo sapiens so one had to believe they had forbears before the floods. A major reason for the historical haze surrounding pre-glacial man is this catastrophe. By wiping out any vestigial signs of an earlier civilisation, it eliminated the motive to look for evidence in currently developed areas. This uncertainty of origin was one of the reasons for a divine source for Vedic aphorisms.

The Vedas contained information in a language that was austere, cryptic and most unlike a primitive creation. For the verses structured on a rigorous metric interval, displayed the intellectual skill of its authors. Creating poetical compositions at the best of times required a huge vocabulary and a flexible flow of words to maintain a rhythm. Resorting to this style of communication meant they were deliberately hamstringing themselves with the full knowledge that the process of information transfer would be made difficult. The normal question from this generation would be 'why would they take the difficult path', but it has an answer. They could not have created the unusually large number of verses, in the same style and format (ensuring the same origin), in the 4000-year interval after the flood. That is assuming evidence of Vedic creations was first exposed as late as 6000 years ago. Even today with all the advertising, publishing and other media marketing aids any serious literary creation fails to get wide acclaim in less than a couple of years. If we go back 1000 years, there exists no widely known physical evidence of the prevailing thoughts then except on stone. That at best can be the equivalent of a few hundred verses. Considering the logistics alone, of collecting tens of thousands of verses into one area, without an associated system, is well nigh impossible even in 6000 years. Soon after the floods, the only immediate concern of the survivors would have been 'how to survive' and not 'how to compose verse'. The Vedas could never have been composed after the floods for the intellectual content far surpasses even the knowledge of scientists today. Just a cursory inspection of a statistical growth-modelling algorithm gives about 12000 years for Vedic information in our possession.

On deeper analysis, one found that the clues in the Vedas itself were an unimpeachable source to proclaim its origin. It was indeed a veritable time capsule for modern man. Lokmanya Tilak, who sprang to the quick because of derogatory statements made by occidental translators of the Vedas, diligently sought out Vedic clues. The esoteric clues made him look at the most accurate clock in the Universe, the stellar sky. By a series of logical and meticulous analyses based on mathematical verification, he deduced the probable and possible date of Vedic creations, after taking into account the dislocation caused by the glacial melt. He arrived at a possible 12000 years to a probable 20000 years for the intervening period. Then he found that the Vedic anomalies in the climatic, solar and stellar cycles were resolved by locating those ancient observers within the Arctic Circle. The variations in the cyclic precessional period of the equinoxes contributed to an uneven polar climatic cycle. (Vedic theory shows that the Solar system orbit in the Galaxy has an eccentricity value similar to planetary orbits.) The Lokmanya along with other geological scientists & colleagues from Europe calculated and established the range of temperature variations that would have been possible then. It showed that, in the cycle prior to the glacial floods, equitable temperature conditions would have prevailed for a long time in the Arctic, when human civilisation could have flourished. He found another fallout. The Zend-Avesta (Zoroastrian religious book) was indeed of the same origin as the Vedas. He discovered detailed confirmation for his hypothesis from the description

of the then prevailing climatic conditions recorded in it. The succeeding generation of survivors, oblivious to their preglacial origin and being nature worshippers, naturally ascribed the Vedic aphorisms to a divine source and labelled it as a 'permanent' creation that was not of 'human origin'. But they did not realise that axiomatic creations too could be defined in the same way.

### **Proof through Stellar positions and post glacial renaissance**

Further, the passages in the Atharvaveda under the Nakshatradevatyam verses identified a sequence of precessional equinoctial coincidences beginning with the Nakshatra Punarvasu, the Vedic zero degree ecliptic position. The recorded coincidence could have only occurred 32000 years ago for the immediate coincidence had taken place just 6000 years back. That was too short a period to rationally justify the quality and quantity of Vedic creations. The fact of its mention is verifiable evidence, which confirms the observation of those stellar sequences by ancient witnesses. It provided an acceptable connectivity to their period of development. Their pinpointing the ecliptic crossing in the Nakshatra Magha when the floods would have taken place acts as additional evidence. Another puzzling factor that adds conviction is the question 'how could they know to accurately calculate precessional cycles when knowledge of this inertial process was a post Newtonian event'. A more precise proof exists in their choice of twenty-eight Nakshatra positions to describe the precessional progress. The number came from an advanced scientific theory mentioned below. In it, a circle contains twenty-eight axiomatic sectors of a coherent state, instead of the arbitrary and primitive 360-degree division in postglacial thought. Notwithstanding these clues, there is another scientific evidence that confirms by default. The answer as to why they created the verses in rigorous metrical framework became clear when the present writer decoded, through the Siddhi process, the first and grandest sloka in the Rigveda. The sloka "*agnimile purohitum yajnyasya devamritvajam hotaram ratnadhatamam*" turned out to be an extraordinary theorem on extraction of energy from space by triggering it into an expansive state. Surprisingly the composer had built-in the proving answer to this theorem as a numerical code wherein each letter stood for a number value. The number, precise to the third decimal place after dimensional conversions, was equal to the modern value of a relative volume of light or Electro magnetic wave formed in one second. That information provided the motivation to invent, test and demonstrate a free energy electric motor. Its novelty lay in the fact that it violated Faraday / Maxwell electromagnetic laws, as it had no magnetic field. It not only worked but also displayed free energy or over-unity efficiency characteristics. This is a singularly effective proof of Vedic excellence in scientific knowledge. The writer and his eldest son demonstrated the motor and explained its principle of operation, outside the known electrical laws, at the Gravitation Energy Conference in Hanover in 1986. The details of the motor were published in the Indian Express on 24<sup>th</sup>. Nov. 1987.

How could the Vedic forefathers have known all this unless they had cracked the scientific codes of nature? There is an excellent reason given further below. However, a little digression will lay the correct foundation to show the contrast between the two systems of scientific analysis. Briefly tracing the 10000-year diary of human renaissance, after the floods, leads to some hypothetical conclusions. It also offers a logical explanation to many conjectured 'facts' of history. The survivors from the Arctic Region turned southward, into Europe, Asia Minor, Persia and India. The present European stock took the path of confrontation to battle out the climatic conditions in Europe, and as described earlier, managed to survive the rigours of that region. They overcame nature's hurdles by sheer will through a range of adhoc innovations that European history extolled proudly. The fact that the origin of all white populations anywhere in the world today leads back to Europe provides a signal confirmation to that hypothesis. The Asiaminor visitors not harassed by the weather gods continued to survive comfortably until a spontaneous genetic re-awakening drove them into intellectual and philosophical innovations. That has produced the only two monotheistic disciplines of Christianity and Islam in one area, almost at the same time, relatively speaking. The older form of Judaism historically had a part to play during the floods but later, it probably influenced the newer theism. It is very indicative that all these theistic disciplines have holistic perception,

as the base for its spiritual practises. That cannot be a mere coincidence for they are very divergent in their religious goals.

The settlers in Persia and India brought with them the relics of the glacial melt in an unusual form. It was a complete system that 'developed, maintained and practised' the natural laws of Universal manifestation based on axioms, as a continuous and continuing process. The preglacial ritualistic practice of repeating the memorised verses daily from the age of seven onwards under the tutelage of Gurus or holistic teachers of different schools, ensured the continued transfer of all the informative verses to successive generations. Instead of creating books, they created a 'human information' memory bank. This living library, based on the genetic propensities of the individual, trimmed, trained and honed to perfection by the specific sage as Guru for each discipline, transmitted knowledge to the next generation. It produced the most effective instrument for transferring knowledge to their next of kin through a human memory bank based on genetic lineage or Gothra. The Gothra system was linked to stellar positions, or Nakshatras, based on axiomatic facts of genetic propensities. The Vedic system of composing verse for oral transmission was a superior form of communication compared to processes that depended on scripts. Its perfection also lay in the construction of memorable phrases, each letter of which, stood for a numerical value. Hence, they were able to transmit even 25 decimal-place-numbers without error. Trained in meditative practices the students became adept in each discipline that needed no pen or paper. The written structure of Sanskrit developed much later by postglacial survivors, was a primitive and incomplete effort at preserving those Vedic verses. The nth generation survivors seemed to have forgotten, the six built in factors for oral communication, (mentioned in the first para,) that a meditative Siddhi process needed. This fact is glaringly evident in some modern translations of two adjacent verses in a set. Often it shows no connection between the two whatsoever. But as every meditator knows one can extract the true meaning of a set only when all its related verses are held simultaneously in a state of contemplation or Dhyana

An effective preglacial system that had continued for ages survived the cataclysmic event by the sheer momentum of past practices spread widely. The relatively few survivors were able to regurgitate their memorised knowledge without a break. It ensured the complete revival and renaissance of Vedic knowledge. That, ostensibly, was one reason why this group lacked motivation to re-invent religious, philosophical or scientific systems. Vedic scientific knowledge was epitomised in one preglacial creation the Bhagavadgita. It had for its axiomatic core, the creation by an intellectual colossus Maharishi Kapila, the Sankhyayoga. The unforgettable & dramatisable background creation, the Mahabharatha had both the Bhagavadgita with the imbedded Sankhyayoga as its scientific and philosophic foundation. To appreciate the sheer ingenuity involved in creating this information transfer process one must realise it targeted three groups simultaneously. While Sankhyayoga (Sankhya) or the theory of counting as Jnanayoga focussed on the rational intellectual, the Bhagavadgita provided the philosophic meaning through a pedagogic dialogue between the personalities of Sri Krishna and Arjuna as Bhaktiyoga. And finally at the lay public through the most vibrant and unforgettable setting of a battlefield background with the possibility of dramatising every event in the manifestation process as Karmayoga. It was not a religion but an axiomatic science that practised its laws holistically and ritually which eventually gained a religious equation. It was an elite concept of practising axiomatic laws called Dharma. The theory based entirely on axioms had eternal validity. For one cannot disprove an axiom.

Above all, it was a system practised by the preglacial forefathers and an accident of nature left it as a relic to postglacial man. The 54<sup>th</sup>. verse in Sankhya gives a circumstantial clue to its origin. The range of manifestation is defined as 'brahma' at one limit and 'stamba' or fixed-point as the other. This definition could never have been created in the postglacial scenario. For Brahma, here, is a revered, pivotal deity, whereas brahma was a technical term for the field of cosmic space in the earlier era. Modern translators must realise that Vedas in verse was not meant for this generation just as we know that Physics today is not aimed at a civilisation surviving a holocaust. Additionally, a telling fact to ponder over is that how and why did the re-writers of Veda and Avesta cover the same process and period, in two different scripts, at about the same time, if they knew of their origin? Again, why was there later, a proliferation-of-re-

interpretations as Bhuddism, Jainism, Vaishnavism, Saivism, Vashistadvaitism etc if it were not a clear indication of dissatisfaction in understanding the preglacial gift? Maxmuller, under the firm impression that the Vedas were a superior form of polytheism, classified it as a henotheistic system, a subordinate to his ideal, the monotheistic religion. His dogmatic views in fact set the pace for mutilating Vedic translations by modern research workers. Despite the foregoing pedagogy, what follows is clinching proof, for the mathematical contents and scientific concepts in this axiomatic theory could never, never have come even from today's scientific elite, let alone post glacial man. The surprise of surprises lies in this ancient treatise, the Holy Grail of unification, that exposes the error in a so-called axiomatic constant of GR that shot Einstein into scientific fame. Therefore, there cannot be any doubt that the Mahabharatha, Bhagavadgita and its core, the Sankhyayoga, belong to the same period and considering its extraordinary scientific content, as shown below, it certainly cannot be of postglacial origin. The confidence, that this theory is precise and correct, comes only from the fact that its numerical parameters match those of Physics with a better-than-acceptable order of accuracy. These comparative numbers are shown below in a tabulated form.

### **The axiomatic and unified theory of Sankhya**

What did Maharishi Kapila propound in the Sankhyayoga (Sankhya) that entitled it to be the core of the Bhagavadgita? It is highly indicative that in chapter 10, verse 26, Sri Krishna identifies himself with Muni Kapila as the master of Siddhi. Sankhya is not only mentioned by name in the second chapter verse 39, but its heading is Sankhyayoga, as an introduction to the most profound philosophy on which the subsequent dialogues proceed. Its importance is doubly certified as the principles of Sankhya are mentioned several times in almost every chapter. Maharishi Kapila created 68 sets of verses (total 70) or Sutras (theorems of logic), each of which contained a proposition and its solution that explained the entire manifestation process of the Universe. While it is well nigh impossible to do justice to this extraordinary theory in this short expose, this brief highlight of its axiomatic principles will be shown as a lesson in logic.

1. The first verse, which had the starting proposition as a query, also contained a conditional solution. The test for its acceptability depended on the correctness of subsequent solutions. It was an intelligent way to connect all the propositions rigorously to the first solution. The method of elliptical negation provided logical internal proof. Even today, Physics would not impose such a constraint for it cannot unify even one set of forces.
2. It was based on numerical axioms, which cannot be disproved and was valid for all times. No theory in science is based on numerical axioms as of today.
3. The entire mathematical process involved only counting. Sir Roger Penrose, author of twister theory, foresaw that a correct theory could only be based on some principle of combinatorial counting.
4. Sankhya theory is based on starting from a clean slate. Physics was started right in the middle from experimental inputs that became empirical and so has tremendous complications for it to find its clean slate.
5. All manifestation processes were defined by one type of event and that was an interaction in three modes. Science today has a variety of definitions, like mass, momentum, acceleration, energy etc, except quantum theory which counts the rate of phenomenon, based on the Planck's constant. It is the closest to Sankhya principles.
6. The first interaction can axiomatically be only between the first two objects. So all the laws of interaction must be completely derived within the very first interaction. Physics having started in the middle has a very long way to go before it can define the first interaction.
7. All counts of interactions were always a ratio between one set and another similar unit, so that dimensionality of the interacting objects cancelled out and only a pure relational and dimensionless number formed the solution. The unit 1 in Sankhya is a ratio of infinity upon infinity. This is an important feature in science for keeping account of dimensionality, which complicates Physics to ridiculous levels.

8. Since only interactions were to be counted, all manifestation consisted only of oscillations or vibrations. In terms of a scientific concept, it meant that Sankhya treated the Universe as a vibrating hologram (spirituality or ethereal vibrations in lay equivalence). It was either changing its state by transmigration of stresses or oscillated in the same location as a frozen hologram. It is an advanced concept that removes all the anomalies in Physics mentioned in the second paragraph.

9. Interactions took place in 3 Guna modes namely simultaneous, resonant and radiant states. The equivalent in Physics is the inelastic or Tama, elastic or Satwa and weak interactive force or Raja. The three Sankhya modes dealt only with time cycle variations as a counting procedure. Logically in a dynamic theory cyclic time was the true variable, for Sankhyan space being real and substantial, could not vary.

10. Space as the foundation of the Cosmos or Universe was described only by the relative interactive qualities needed to sustain manifestation and ensured that only the process of counting interactions was used to account for its balanced state. From the scientific point of view it was not necessary to consider the quality of space or its contents and showed that Sankhya was a relativistic theory.

11. Manifestation is self-similar and scale-invariant. This allows the same formulation to be applied mathematically to define the Universe, Galaxy, Sun, Nucleon, Electron or any particulate state through one constant parameter. Physics, not being scale invariant, needs at least three parameters and they are not constants.

12. The fundamental field of space in Sankhya is mathematically defined in Sanskrit as Aikanta (coherent or frozen as a single entity), Athyantha (without end-perpetual), Atho (dynamic) and Abhavath (unmanifest or balanced). Physics cannot define space as it is classified as a vacuum.

13. The holographic mode of manifestation is proved mathematically by showing that all phenomenon is bound simultaneously by a spectrum of seven states and released sequentially by one mode. The enigma in science, why sound, light, particulate, molecular, atomic, nuclear and sub-particle level have a periodicity spectrum, is resolved axiomatically.

The above parameters are some of the 'easy to understand' aspects that differed from Physics. The mathematical aspects of this theory are all encompassing, profound and complete in all respects. The unified solutions are derived internally and matched accurately to provide numerical answers to every known and unknown stable parameter in Physics and Cosmology. It has its own system of internal proof by matching six alternate derivations to 25 decimal places. Sankhya enables the tabulation of the entire Cosmic manifestation parameters similar to any mathematical log table or almanac, with the certainty there will be no phenomena found falling outside it. This aspect is not possible in science today. How do we know Sankhya is right? Differentiating the Sankhya-derived-mass of the Universe by its smallest displacement leaves a precise single unit-angular displacement value of the very first interaction. Such accuracy is possible only in the realm of the divine! Sankhya also gives equally accurate numerical solutions to both scientific and holistic problems in phenomenon. The latter process by itself is an extraordinary confirmation of Sankhyan supremacy, for science has deliberately closed its eyes to it and actually believes holistic perception does not exist!

### **An overview of Sankhya axiomatic principles in relation to Physics.**

An outstanding feature of Sankhya is that no measured or empirical inputs are required and the axiomatic theory starts by manipulating the interactions between two objects in various ways. Explaining briefly, Sankhya is based on counting only oscillatory interactions as a ratio of a standard & axiomatic cycle of 10 counts which are dimensionless, scale-invariant, coherent, synchronous, reflection invariant and symmetric. Though space has substantial qualities identified as the Purusha State, it cancels out, as all measurements are relative comparisons through its smallest unit the Moolaprakriti. So the Purusha's basic qualities are not mathematically relevant in defining phenomenon. Any Sankhya equation is always the algebraic sum of three Gunas as Tama (strong force), Raja (weak force and gravity) and Satwa (Electromagnetic force) or a ratio of Tama / (Raja into Satwa.). Hence, all equations compare only three real dimensions. There are three cyclic states to define time and are governed by three principles,

Simultaneity, Self-similarity and Relativity and these have scalar (full force), tensor (stress dependant force) and vector (time dependant force) characteristics respectively. All of space is always in a dynamic oscillatory state, at an axiomatic rate of 296575967 oscillations per cycle of 10 oscillations or 299792458 oscillations at a metre wavelength / second, which equals the velocity of light in vacuum. The extraordinary fallout from deriving the holographic oscillatory state is that it corrects velocity of light in Physics relativistically by the solar orbital velocity in the Galaxy by the factor 1.010845. Michelson & Morley detected this corrected value but no one realised that it was relevant and thought the experiments failed! Their results displayed a Doppler blue shift in frequency. Hence, the frequency of light in the Solar system cannot be constant. It automatically explains the cause of global warming, which in fact led to the glacial catastrophe.

The Sankhya division of interactive states is shown only to compare values in Physics. It is shown in a simple and generalised way to make it understandable to non-scientists. The reader's attention is drawn to this fact that in Physics all values have been measured whereas in Sankhya all values are calculated from axiomatic variations of the numeral two and that principle was evolved more than 12000 years ago. Despite that, the difference is extremely small. All numbers are interactive count rate per self-similar cycle. Where dimensional values are given for comparison, the Metre-Kilogram-Second system is used with unit time as 1.010845 seconds, due to the relativistic shift from the solar orbital velocity. Values in Sankhya being axiomatic derivations it can never change. (B=Billion. L=Light. Y=Years. M = Mega. G = Giga). Numbers shown with like 10e+6 means it has 6 zeroes or the real value is a million counts. Or 10e-6 means it has 6 decimal places or  $1/1000000^{\text{th}} = 0.000001$ .

Sankhya Stable states. Equivalent in Physics shown in last column.

Purusha	Andhatamishra state	Max Mass in Blackhole state	No equivalent in Physics
Prakriti Mahat	Moha state	Max Mass in coherent state	Hadron- quark domain
Prakriti Sapta	Maha Moha state	Max Mass in resonant state	Hadron- Nuclear domain
Vikriti Mahat	Moha state	Min Mass in coherent state	Lepton- Electron
Vikriti Sapta	Maha Moha state	Min Mass in resonant state	Lepton-Neutrino
Moolaprakriti	Vikaro state	Min Mass in transmigratory state	No Equivalent

Stable Mass particles compared to Planck's constant as energy value

	Sankhya Mass Count	Physics kgs	Sankhya kgs	Sankhya GEV	Physics (name)
Purusha	10e+50	None	0.9149 kgs	5.133e+26 GEV	None
Prakriti Mahat	50-8 =10e+42	2.177e-8 kgs	2.203e-8 kgs	1.236e+19 GEV	Planckmass
Prakriti Sapta	50-25=10e+25	1.672e-27 kgs	1.675e-27 kgs	0.93927 GEV	Proton
Vikriti Mahat	50-28=10e+22	9.109e-31 kgs	9.11 e-31 kgs	0.511 MEV	Electron
Vikriti Spectra	$2\pi$ 10e+17	6.626e-34 (Joules/sec)	6.7e-34 counts/sec)	53.45 EV x 7 (7 neutrinos)	Plankconstant. As energy unit
Vikriti Sapta	50-33=10e+17	None	9.53e-35 kgs	53.45 EV	Neutrino
Moolaprakriti	1 count	None	1.344e-51 kgs	7.543 e-16 EV	None

Interactive qualities in a cycle (Not identified in Physics)

Principles of Yuga	Yugapac-Simultaneity	Swabhava-Self-Similar	Kramasa-Relativity
Yuga -Time Cycle	Instantaneous-Spacelike	Resonant -transmigant	Sequential-Time like
Sargah Int. creation	Abhiman -(self potential)	Tensor interaction	Ahankar (acceleration).
Sargah-Ext.creation	Linga- Mass	Vector interaction	Bhava- Charge

Comparison of axiomatic Sankhya and Einstein's cosmic concepts

Observations in Universe	Sankhya-derived	Einstein -Estimated	Error in Physics
Radius Maximum	19.26 B. L. Y always	18.84 B. L. Y	Time cycle
Time cycle	30.64 B. Y always	29.76 B. Y	Time cycle
Radius Today	12.8 B. L. Y always	13.19 B. L. Y	Time cycle
Hubble expansion rate (conceptual error)	6.283e+17 Change in Entropy of space	Megaparsec / 49000 = 6.23e+17	Concept of Space
Critical Closure Density	3.63e-25 kgs/m <sup>3</sup> always	1.48e-26 kgs/m <sup>3</sup>	Error 8 Pi
Expanded Envelope	1.5e78 m <sup>3</sup> always	3.83e+79 m <sup>3</sup>	Error 8 Pi
Mass of Universe	7.8e +52 kgs.	5.68e+53 kgs	Error 7
Radius of Universe	5.99e +25m	1.236e +26m	Error 6/Pi

Classification of Sankhya Holographic states in counts per cycle.				Class in Physics
Class	Tama (Compress)	Raja (Interactive)	Satwa (Expand)	Spectrum
Total counts 10e+50	10e+28 Entropy	Interactive Flux	10e+22 radiation	
Coherence(Tamasic)		3 axis synchronised		Singularity
Andhatamisra	10e+8 Blackhole	28-8 =10e+20		Blackhole
Prakriti mahat		2 axis Synchronised	Coherent Limit	Planck mass
Moha	10e+10 Coherent	20-10=10e+10		Heavy Quark
Mahamoha	10e+10 Resonant	10 - 3 (axis)=10e+7		Quark
Interactive balance		Spherical Flux 3 axis		Strong
Prakriti Sapta (Rajasic)	22 +3=10e+25 Interlocked mode	22+3=10e+25 Area Flux 2 axis	Resonant Limit	Hadronic Bosonic
Abhiman		8+3=10e+11		Phase potential
Ahankar		8-3=10e+5		Phase velocity
Linga		9-3=10e+6		Magnetic
Bhava (Satwic)		9-3x2=10e+3 Radial flux 1 axis	Radiant Limit	Electric 5.133e+26 GEV
Vikriti Mahat/Sapta	25-3 =10e+ 22	20+5=25 25-3=22	10e+5	1.236e+19 GEV
Tusti internal	10e+20	16+4=10e+20	10e+4	0.93927 GEV
Vikaro	10e+16	3+13=10e+16	10e+3	0.511 M EV
Tusti external	10e+13	16-3=10e+13	10e+5	53.45 EV x 7
Siddhi	10e+8	13-5=10e+8	10e+8	53.45 EV
Moolaprakriti	1	1	1	7.543 e-16 EV

There are a host of related parameters that will be published later in the author's book the 'Secrets of Sankhya' along with an accurate scientific comparison that puts Sankhya on the pedestal of 'Theory of Everything'. Coming to the major anomaly of the 9-cup loss during measurement, that started the train of redemptive principles in Physics, Sankhya solved it most elegantly. Recall that the blind man held the measuring cup for one clock second, as he could not detect the completion of this process. Sankhya principles axiomatically derived the smallest measuring cup with the fastest filling rate of seven-cups-at-a-time and stopped filling automatically because the potential difference became zero! Then there was no loss at all for the observer just counted the cups, as and when he took them. Now his measurement would always tally, with what he took and what was left, as he could never be faster unless he filled more than 7

cups at a time. The axiomatic spectral characteristics forbade exceeding 7 states. In plain language, if one immersed the flattest measuring cup just below the water level, it fulfilled those conditions. Scientists should 'see' that process as the interactive flux transfer rate in a blackhole or frozen hologram, confirming Hawking's diction that its surface area can never decrease. The proof (shown in table above) is that even the much larger Planck's constant is also equal to seven Neutrino masses acting simultaneously as a photon in a radiant spectrum!

Why did not scientists arrive at a similar conclusion? There were two major reasons. Planck calculated the value of the quantum by evaluating experiments that measured black body radiation to simulate a balanced state. He evaluated radiant quanta in transmigratory motion and concluded that was its final value. According to Sankhya, it was the equivalent of the quanta in the radiant mode of an interaction. But a quantum at "rest", the Moolaprakriti, interacted in the simultaneous or frozen mode of a blackhole and its value was very different. It was  $10e+17$  times smaller or it was equal to one unit of change in the entropy of a tiny blackhole that Sankhya has identified in every point in space. Such a small unit of measure hidden in the Planck energy scale caused the uncertainty in measurements, value of matter density, particle wave duality and the enigmatic Planckian fluctuations. It is indeed close to the Cosmological constant that Einstein threw out as his blunder. Only when a fluctuation exceeded a change in entropy equivalent to  $10e+17$  it radiated a photon. So this huge energy reservoir was hidden. Hubble detected this delay and misread it as an expansion, for logically the unit rate of change in entropy will take place only at the very end of an interactive radiant cycle or  $10e+17$  metres away.

The numerical proof for this fact comes from the enigmatic 2.7 degree Kelvin background temperature in space that Peebles et al recorded. The  $10e+17$  modes of change in entropy in a micro blackhole in space logarithmically equals the natural log value of  $e = 2.718$  or the total sum of self-similar change in volume per cycle. Mathematically it could never exceed 2.718. Hawking et al exposed the entropy value but as a macro blackhole phenomenon on a solar scale, for science was apparently unaware of the concept of scale invariance and reflection symmetry in a frozen hologram. So a tiny blackhole is no different from a massive blackhole except for its self-similar time cycle. As a simple example if ten people clap one after another the ten sequentially related claps could be counted as 'ten claps' but if all ten clapped simultaneously only 'one dense clap' would be counted. It described charge and mass concepts respectively in a holographic world. Secondly, the concept of energy to define phenomenon in space was incorrect. The frozen mass quanta or Moolaprakriti mass vibrating in the same location of space as a coherent hologram had not been taken into account. It provided the missing darkmatter-mass value (that cosmologists were searching for) as Planckian fluctuations. Another serious error had occurred in Physics. Interactions always act in a straight line and that is an axiom. Hence, there can be no curvature inherent in any fundamental interaction. Only the loci of a sequence of interactions looked curved but Riemann & Gauss geometry made it a fundamental characteristic of space. Einstein used it as the basis for GR, which introduced the erroneous axiomatic constant  $8\pi$ . Because of the foregoing anomaly, Einstein desisted from defining a singularity. For his problem was in defining the boundary of a point! Opening out  $8\pi$  through self-similar mathematics of the Sankhyan Andhatamisra domain displayed the hidden entropy spectrum in all its glory, as shown in the tables above. That concept was the very stroke of a genius, Maharishi Kapila, the veritable intellectual colossus of a preglacial era.

While laboratory instruments emulated all the five senses, it could not imitate nature's own instrument the brain, which was the core that maintained all forms of life. Sankhya proves that the two halves of the cerebral system were a sensory signal multiplexing instrument, Buddhi and Siddhi, based on the same interactive Guna qualities of space. It was indeed the most magnificent instrument to detect a null current or equi-potential state. The brain, detecting the Moolaprakriti stress currents as an imbalance in the potential of the two cerebral lobes, transmitted its difference through the (eye of wisdom) pineal gland to the Mooladhar or the lower spinal plexus that magnified it. It was an experiential signal, the much spoken about Kundalini current. On receiving a human query, the two unbalanced cerebral lobes went on a furious search till they reached the balancing point of a null Moolaprakriti current. On receiving that answer, the human gave a sigh of relief, demonstrating his utter satisfaction. That process signified the

symbolic 'OM' state. It was epitomised in Patanjali's Yoga Sutras. All holistic phenomenon like ESP, astrology, miracle and manifestation that seemed irrational was due to the Moolaprakriti surge. It was caused by a phaseshift or 'twist in space' that had not yet become an identifiable Vritti or photon. It resulted in a momentary scalar force whose origins were not detectable. The unvarying shape of the lunar and solar tidal envelope around the earth is a further witness to the Moolaprakriti surge. Hence no instrument based on measuring an energy differential could detect a change in the phase shift of a potential. Aharanov and Bohm proved this point through experiments. But every cerebral system based on genetic cells in man, animal or plant could detect it, as a change in feeling, mood or physical state. Backster proved this aspect through experiments on plants and it is known as the 'Backster effect'. Especially, more so for man, when he was in the null or balanced Theta brain wave state of 3.75 cycles per second in deep meditation. The Maharishi Mahesh Yogi's students bounced 'crossed-legged' along a laid out demonstration course, in full view of the public, in the Theta or Siddhi-state. Ayurveda operated through the same Guna laws but applied to 'genetic-molecules' as Vata, Pitta and Kapha, synonymous with Satwa, Raja and Tama states respectively.

As everything was affected by the ever-present stellar Moolaprakriti stress transmigration currents astrology played an important part in influencing the trends in all interactive aspect of genetic matter. Maharishi Kapila, through his holographic theory, gave a mathematical basis to understand one of the most enigmatic concepts that pervade all religions. The concept of the human soul and its consequence was the interaction of a resonant hologram that acted according to the principles of the three Gunas. Epitomised as the (field theory) Kshetrajna of (actions) Karma in the Bhagavadgita, it followed the same axiomatic laws of a Vritti or photon but in its own time cycle. Dr. Moody had published accounts of 'near-death-experiences' of over 2000 people that were nothing but a refusal of such wandering holograms to disintegrate on those occasions. Sri Krishna tells Arjuna the same fact that those he hesitated to slay were already dead as their holograms had lived out its time then! The Hughes Drever experiments did detect the Moolaprakriti stress transmigration current in space but was declared an instrument noise by wise scientists. Such a current removed the need to propound the Principle of Equivalence, as there was only one stress current in space. It acted as gravitation, electromagnetic, weak, strong forces or as phase-shifts in the quark and blackhole domains, depending on cycle time. The foregoing theory could never, repeat never, have come from even today's citadels of Physics and Cosmology, let alone postglacial man, unless one resurrected the 'Vedic divine origin' aspect again. In this extraordinary background, the Lokmanya's hypothesis based on meticulous research becomes very relevant.

As pointed out earlier, the scientific peerdom will be the one major obstacle to a smooth and effective transfer of this axiomatic science of Dharma to the public domain. Because current Physics and Cosmology will be reluctant to switch over to a holographic, dimensionless, scale-invariant, reflection-invariant theory, in a space that is certainly not a vacuum. Moreover introducing axiomatic principles into the laboratory domain will be like setting the cat among the pigeons. That would automatically remove the principles that glossed over anomalies and place theoretical science on the back burner. An undesirable synthesis, for the left-brain 'rationalists' of science, would be the need to work with so called right brain 'irrationalists'. For in this axiomatic and holistic science the invisible part of space takes on an unimaginable share of importance. Then experts in handling psychokinetic phenomenon like the Sathya Saibaba or Uri geller could help holistic science quantum leap into new frontiers. For instance, as early as 1930, both Annie Beasant and Leadbeater published accurate sketches, in minute detail, of 92 atomic elements in the periodic table by 'seeing them visually' in a meditative state. But nobody believed it for 50 years till Dr. Phillips confirmed it his book recently. Over a period of years, Peter Hurkos helped the Dutch police to solve complex crimes through clairvoyant vision. The holographic background gives a new twist to astrology, much against the so-called rationalistic view. It affects every phase of predicting organic or inorganic phenomena, like earthquakes, stratospheric twitching, cosmic ray showers and a host of things too large to mention here. And that is because the concept of Gravity as a force is too large a tool to detect the microscopic Moolaprakriti rumblings in the same gravitational field. In fact, numerous people have reported experiencing headaches before an earthquake. Animal and birds have been seen to

flee the area before such an event. Instead of instrumentally imitating, the cerebral functions, a new cadre of holistic scientists, may have to evolve in order to attain speedy results, as developments in this area need not be of the existing pattern at all.

For instance the entire information technology spectrum can switch over to an organic, genetic recombinant 'hardware' that grows, maintains and renews like any living system, operating on self generated low voltage organic D.C. power systems. It could also do parallel processing of information when demanded. There could be a revolution in power generation concepts through the production of 'fuel-less-power' direct from space. For, the hidden coherent gravitation field itself is capable of yielding unlimited supply of both electrical and mechanical power as elucidated through Sankhya principles. The work of the scientific genius Tesla, is a case to point, in that area of field-energy mechanics. Next, the mechanism for initiating cold fusion will be made easy when scientists understand the new Sankhya principle of 'simultaneity', the governing theory for all dynamic coherent states. There is no evidence, in Physics even today, of a self-similar mathematics regime that operates in the 'simultaneous interactive' regions with precision. Hawking, in one of his lectures bemoaned the inadequacy of the Schroedinger equation (to solve blackhole problems), the only simple mathematical tool available in this spectrum.

The principle of self-similarity, embodied in the three Gunas, is symbolically represented by a bow. Forces of compression in the arch as a vector and tension in the string as a tensor are in balance simultaneously. When an arrow was shot it represented a scalar force and what the Schroedinger equation calculated was the depth of penetration in the target! No doubt Hawking lamented its limitations for Maharishi Kapila's Moolaprakriti measured the vibrating rate of the string before the arrow was shot! Arjuna, the archer, was a master of the symbolic Gunas in the Gita, while Sri Krishna was the ultimate architect of the unified science of Dharma in the Universe. The 69<sup>th</sup> Sutra states that Sankhya is a secret or coded creation and apparently not meant for open circulation. Hence, there is the danger that, while such scientific development could flourish in the benign countries, misuse of fundamental knowledge in the hands of unscrupulous groups could produce disastrous effects. For the key to fusion energy, genetic recombinant technology, quantum information-decoherence-entanglement-avalanche phenomenon and ESP subliminal-information-transfer, are areas, among countless other possibilities, that could make the earth a veritable hell to live in if misused by mindless rulers.

Finally, the creation of Sankhyayoga by Maharishi Kapila is invaluable on three counts.

1. Sankhya unified the two concepts of science and religion by demonstrating its equivalence through axiomatic laws.

Accepting the fact that cosmic laws must remain the same with or without an observer, every human being should have been able to understand it in an identical way. But driven by their innate genetic Guna-qualities people polarised broadly into two groups with rationalistic (scientific) and holistic (religious) preferences. The prevailing view was that science, based on a sequential logic starting from an empirical source-level, described phenomena effectively. However, scientists rationalised that theistic principles, on the other hand, pre-empted the scientific analytical process by identifying a timeless and powerful creator as the initiating cause. Supporters of religious dogma argued that scientific analysis was matter-oriented, temporal and ignored the eternal aspects of reality. But Maharishi Kapila's theory elegantly pointed out that an arbitrary source-level in science or the enigmatically powerful creator in religion could both be conceptually replaced by an axiomatic source-law of nature called Dharma. Axioms are not created for they are always there as a pure relationship of two numerical variables. As is well known axioms cannot be disproved and are therefore valid eternally to all humanity. This fact automatically endowed it with the mantle of divinity and so it logically satisfied the fundamental precepts of eternity in religion. The goal of scientists too has always been to base scientific theories on axioms, to eliminate the uncertainty at its source-level. The intellectual magnificence of Maharishi Kapila showed through exquisite mathematics that this very axiomatic source had the power of the most powerful creator that man or any observer could ever conceptualise. Since Sankhya derived the ultimate Purusha state purely through axioms, where was the reason for science and religion to differ? For all their core, requirements of a powerful, eternal and logical

source were fulfilled beyond all human expectations (Physics has yet to discover the Purusha state of coherent power. Its value is shown in the tables above).

2. Maharishi Kapila unified the two contentious concepts of materiality and spirituality by demonstrating through precise mathematics that all manifestation was a hologram or the very embodiment of spirituality. He underscored the fact that one cannot have spirituous vibrations without interactive matter, which was the core-Guna-theme in the Bhagavadgita.

The 50 verses in chapter 13 in the Bhagavadgita gave an exhaustive pedagogic explanation of the field concept or Kshetra comprising the Brahmanda or field of cosmic space. Maharishi Kapila showed unequivocally that what an observer detected was only a vibration from an interaction between two objects. Present day Physics too has confirmed that everything in this Universe is composed of vibratory or oscillatory components, be it solid or evanescent. Through the three Guna interactive modes (explained earlier), Sankhya shows (through Sutras 3 and 46) with utmost numerical clarity that the solid, massive and static Purusha state of ultimate power is only composed of the lightest Moolaprakriti vibratory state. But there are  $10^{50}$  Moolaprakriti units (shown in the table above) interacting simultaneously in the Purusha state. That unimaginable number acting simultaneously contributes to the impression of solidity. The field of molecules we call air can be blown away easily by us but the same air in a tornado blows away our very homes, displaying a hidden factor of solidity that could never have been conceptualised. It is just the simple molecule of air acting simultaneously as a group. Sankhya mathematics shows that tornado represents a moving hologram called Vritti. The Purusha and the Moolaprakriti are the same moving holograms albeit of different values. So is the Proton, Electron, Neutrino, Sun, Moon, Galaxy, the human being, one has only to name it. The epitome of the concept of spirituality is the field or Kshetra that forms the human soul, the very opposite of the common view of 'materiality' in a matter dominated world. But the human soul is nothing else but a Moolaprakriti hologram, the very Kshetrajna or the 'knower of the field' that Sri Krishna explains to Arjuna in the Bhagavadgita. Then where is the difference between the so called matter composed of electrons and protons of  $10^{27}$  Moolaprakriti units and the spirituous soul of a human being containing the same number of those fundamental holograms? Only a heckler will fail to see the identical nature of the two states of manifestation. That is why Arjuna is told to be without the three Gunas in order to understand the true nature of phenomenon. Because the Guna or innate genetic quality of an individual, clouds his ability to 'see through' the confusing variety of manifestation, that hides the real nature of an event. Or in simple words don the robe of objectivity to see the woods for the trees. Physics too suffers from the same malady for in naming the Planck's constant as an 'unit' of energy they had unwittingly collared the very holographic tornado in its nascent state. One hopes that Maharishi Kapila's unification paradigm would end the needless divide between Physics and holistic science or the materialistic science and spiritualistic religion. Its time that man realised, by uniting the two pseudo-concepts, natural law will allow him to really experience the bounties of this magnificent universe in the easiest possible manner.

3. In conclusion, he demonstrated the oneness in the material underpinnings of Reality with the spiritual supremacy of a God concept, as just two complementary aspects of a contemplative human mind. Or the concept of God and the Cosmos being inseparable in the Vedas, it was an Omnipresent, Omnipotent and Omniscient state.

The Visvarupa state in the 11<sup>th</sup>. chapter of the Bhagavadgita is a pedagogic expose of the equality of the concept of God and the Universe in symbolic terms. Pedagogic definitions are open to misinterpretation. Mere numerical identification, though precise, is again open to being labelled an absolute, which has no relevance in a relativistic world. But numerical axioms are a relational truism based on the natural proportionality of numbers that remain true eternally. As shown earlier, the first interaction can only take place between two objects and can only occur in three modes. Out of myriad possibilities, Sankhya derived one axiom that described the three Guna modes of interaction which was correct under all variations and for all times. It encompassed the law of self-similarity when two or more modes of action occurred

simultaneously. Recall the earlier example of the bow. Astoundingly through that one self-similar Guna law, Sankhya theorems derived all aspects of universal manifestation and the small-tabulated example shown above is a witness to its profound depth. Maharishi Kapila proved mathematically that one axiomatic law of Dharma operated eternally, self-organised and self-controlled, thus enshrouding it with the indelible mark of divinity. It truly described a Universe beyond humanity. It needed no human beings to understand Cosmic physics. Viewing it objectively it must be so. It is indeed an axiom.

Maharishi Kapila was only needed to tell other human beings what that exotic law was for he understood it. But why was that necessary? Could not others too do what he did? They too could have and that was the theme in the Bhagavadgita. It was just one simple message -be without the Gunas. But how could a human being be without the Gunas unless he knew what it was and that it was there in the first place. Even after 400 years of dedicated modern scientific investigation Physics had not even suspected its existence, let alone discover and use it. Then how can man? That was the theme of Maharishi Kapila's Sankhyayoga where he laid bare the meditative Siddhi process operating in the Guna mode (through Sutras 4,5 and 6) that was later elaborated by Maharishi Patanjali. Despite this caveat, man, driven by innate feelings of dissatisfaction, sought the very same goal that Maharishi Kapila did. But in another way. Man's dissatisfaction came from within him. To a fundamental query like 'who am I' to his left cerebral lobe with sequential analytical abilities, the right cerebral lobe awaited its reply. It kept on processing that reply in the holistic simultaneous mode till it was satisfied. While in the case of Maharishi Kapila, it stopped and he created Sankhyayoga, but for all of us lesser mortals, it still kept seeking an answer. On being diverted to do its essential chores, the right cerebral lobe cried a temporary halt and holistically named the Creator as the cause of 'who he was'. Changing this mindset needed a paradigm shift towards a purely intellectual objectivity, wherein all past mental conditioning had to be jettisoned ruthlessly, even if temporarily. The meditative Siddhi process did just that and increased the chances of attaining a satisfactory answer. While the dichotomy continued, the contemplative search too continued to support the need for a separate Creator to create an Omnipresent Reality. When would it end?

The intellectual greatness of Maharishi Kapila lay in his demonstration of an extraordinary fact, through the opening Sutra. Wherever manifestation dissolved by attaining a coherent (hence restful) state, what was left was the Aikanta-Athyantha-Atho-Abhavath state or the Coherent, Eternal, Dynamic but Unmanifest state of Brahmanda, the fundamental field of cosmic space. Its perfection lay in the fact that this process applied to any fundamental field for there was only one Guna law for all such fields. Hence, the cerebral field too, if allowed to attain its fundamental state, was left in the Aikanta-Athyantha-Atho-Abhavath state. It was an axiomatic Siddhi state where the left and right cerebral halves balanced perfectly because the Gunas disappeared into its single Moolaprakriti transmigration state. It was at last without the Gunas. The concept of Creator and the Reality dissolved into each other and what was left was only an extraordinary experience of that fundamental field of Brahmanda in the Aikanta-Athyantha-Atho-Abhavath state. The remnant state of utter and deep satisfaction helped to change the mindset in time. Having demonstrated that the conceptual difference between the Creator and the permanent Reality actually merged into one another, that fundamental state could then be described objectively only as an Omnipresent, Omnipotent and Omniscient state. Or Brahmanda, the field of Cosmic space. Was there any uncertainty? None except in the human mind that lacked the knowledge to overcome it. Can we quantify the error factor that a human mind must accept? Yes, it is just one Moolaprakriti transmigration rate for 1/10 of a second. Can we sum up the gift that the intellectual colossus, Maharishi Kapila, gave to humanity? What could be greater than numerically specifying THAT extraordinary state of REALITY in unequivocal terms for mankind so that he learns that there is no such a thing as UNCERTAINTY in that state in the Universe.