

The Nature of God

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2 Introduction to God

One of the most basic beliefs held by the majority of people within modern society is the belief in a being commonly known as God. Theologians, Philosophers, Prophets, Gurus, Sages and Messiahs throughout history have held varied beliefs, in terms of their understanding regarding this power. The most common among these include omniscience (all knowledgeable), omnipotence (all powerful), omnipresence (everywhere), perfect goodness, eternal and a necessary existence.

3 Primary Theories Regarding the Nature of God

In this next section we take a high level view at the varying nature of theories regarding the nature of God. We shall examine how many of those theories Sikhism supports in a later section.

Belief Name	Belief Description
Theism	Belief in the existence of a god or divine being
Monotheism	Belief in the existence of one deity, or in the oneness of God
Monolatry	Worship of a single deity independent of the ontological claims regarding that deity
Henotheism	Devotion to a single god while accepting the existence of other gods
Deism	Belief that one God exists. However, a deist rejects the idea that God intervenes in the world.
Monism	Belief that everything is One and that there are no fundamental divisions
Pantheism	Belief that God is the natural world / universe
Panentheism or Monistic Monotheism	Belief that God is within every part of nature, and timelessly extends beyond as well. Panentheism is essentially a unifying combination of theism (God is the supreme being) and pantheism (God is everything). While pantheism says that God and the universe are coextensive, panentheism claims that God is greater than the universe and that the universe is contained within God. Panentheism holds that God is the "supreme affect and effect" of the universe
Monistic Theism	This belief encompasses pantheism, monism, and at the same time the concept of a personal god
Substance monotheism	Belief that the many gods are different forms of a single underlying substance
Polytheism	Belief in or worship of multiple deities or gods. In polytheistic belief, gods are perceived as complex personages of greater or lesser status, with individual skills, needs, desires and histories. These gods are not always as being omnipotent or omniscient; rather, they are often portrayed as similar to humans (anthropomorphic) in their personality traits, but with additional individual powers, abilities, knowledge or perceptions.
Pandeism	Belief combining deism where God can only be reached through reason and pantheism where god exists within nature
Personal God	The broadest definition of this term is a god who is a personal being, i.e. a being with a personality, including the capacity to reason and feel love
Atheism	Belief in nothing supernatural or god like

Agnosticism	Belief in some form of skepticism with regards to God as it is unknowable
Ignosticism	Similar to both weak atheism and agnosticism
Misotheism	A belief in hating or punishing gods for not fulfilling wishes or desires

4 Sikh Teachings Regarding the Nature of God

4.1 Mool Mantra

The Sikh Holy Scripture starts with the Mool Mantra which provides a concise insight into some of the eternal qualities of the supreme spirit.

“One Universal Creator God. The Name Is Truth. The Creator who lives within Its creation. No Fear. No Hatred. Immortal, Without Form, Beyond Birth, Self-Existent. Realised By Guru's Grace ~ Chant And Meditate: True In The Primal Beginning. True Throughout The Ages. True Here And Now. O Nanak, Forever And Ever True. ||1||” (SGGSJ, p.1)

4.2 Nirgun - Sargun

The nature of God in Sikhism is called Nirgun-Sargun which describes two seemingly opposite states existing at the same time.

Nirgun = without qualities or the unmanifested transcendent God

Sargun = with qualities such as form, colour, weight, all-compassionate, all-knowing etc or manifested immanent God

There are some lines in Gurbani which describe the Nirgun qualities of God, and some the Sargun qualities and some which describe a mixture of both. The following quotes from Gurbani explore the ultimate Nirgun state of God.

“My Lord of the Universe is great, unapproachable, unfathomable, primal, immaculate and formless.” (SGGSJ, p.448)

“He has no form, no shape, no color; God is beyond the three qualities. They alone understand Him, O Nanak, with whom He is pleased. ||1||” (SGGSJ, p.283)

It was the Nirgun state of God which existed initially. Nirgun God created the material universe within which God also exists. So God assumed a form within His own creation and became Sargun, but at the same time remains in His Nirgun state.

“From formless, He appeared as form. The Creator has created the creation of all sorts. The attachment of the mind has led to birth and death. He Himself is above both, untouched and unaffected. O Nanak, He has no end or limitation. ||2||” (SGGSJ, p.250)

“O imperishable, eternal, unfathomable Lord, everything is attached to You. ||7|| The Lover of greatness, who dwells in heaven. By the Pleasure of His Will, He took incarnation as the great fish and the tortoise. The Lord of beautiful hair, the Worker of miraculous deeds, whatever He wishes, comes to pass. ||8|| He is beyond need of any sustenance, free of hate and all-pervading. He has staged His play; He is called the four-armed Lord.” (SGGSJ, p.1082)

The following quotes from Gurbani talk about the dual nature of Nirgun-Sargun states.

"He Himself is formless, and also formed; the One Lord is without attributes, and also with attributes. Describe the One Lord as One, and Only One; O Nanak, He is the One, and the many. || 1 ||" (SGGSJ, p.250)

"He Himself is formless, and He Himself is formed; whatever He Himself does, comes to pass." (SGGSJ, p.551)

"You have thousands of eyes, and yet You have no eyes. You have thousands of forms, and yet You do not have even one. You have thousands of Lotus Feet, and yet You do not have even one foot. You have no nose, but you have thousands of noses. This Play of Yours entrances me. || 2 ||" (SGGSJ, p.13)

4.3 Is Nirgun – Sargun a Contradiction?

Something being unmanifested and manifested at the same time would appear to be contradictory. But this is not difficult to explain with the advent of Quantum Physics with its refined understanding of nature and her laws.

Quantum Physics breaks bi-valued logic by allowing matter (prakriti) to exist in a condition of superposition of many different states. This is supported by solid empirical data from experiments such as the double slit experiment and through the commercialisation of such principles into working technologies such as the quantum computer.

So the Sikh concept of God is indeed a Quantum concept allowing the superposition of both a formless and formed state to exist simultaneously.

There are other not so technical methods of understanding Nirgun-Sargun such as the qualities of the soul which are transcendent (Nirgun) and the form of the human body and the mind which is immanent (Sargun). For a person to enjoy life they need both the Nirgun and Sargun aspects of God to be working together (mind, body and soul).

Similarly, in nature a tree has a part which is visible to the naked eye (trunk, branches, fruits and leaves) and a part which invisible to the naked eye (roots). The invisible part would be the "Nirgun" aspect and the visible the "Sargun" aspect of the tree. Both are required for the tree to exist.

4.4 The Names of God

God in Sikhism is sometimes described as the Guru, the one who enlightens humanity and helps us along our path.

"The Guru is All-powerful, the Guru is Formless; the Guru is Lofty, Inaccessible and Infinite." (SGGSJ, p.52)

But God is technically the nameless (anamee) being who has a countless number of names assigned to Him by people from the many different spiritual traditions across the many worlds in our universe.

"Your Names are so many, and Your Forms are endless. No one can tell how many Glorious Virtues You have. | |1| |Pause| |" (SGGSJ, p.358)

4.5 Who Created God?

God is self created, with no other creator.

"In the beginning, in the middle, and in the end, He is the Formless Lord. He Himself is in the absolute state of primal meditation; He Himself is in the seat of peace. He Himself listens to His Own Praises. He Himself created Himself. He is His Own Father, He is His Own Mother. He Himself is subtle and ethereal; He Himself is manifest and obvious. O Nanak, His wondrous play cannot be understood. | |1| |" (SGGSJ, p.250)

"He created Himself - at that time, there was no other. He consulted Himself for advice, and what He did came to pass. At that time, there were no Akaashic Ethers, no nether regions, nor the three worlds. At that time, only the Formless Lord Himself existed - there was no creation. As it pleased Him, so did He act; without Him, there was no other. | |1| |" (SGGSJ, p.509)

4.6 Sikhism and God Theories

How many of the God theories in chapter 3 does Sikhism support? Well as it happens it supports a large percentage of them which highlights the mature and complete understanding of God nature within Sikh spirituality.

4.6.1 Theism is supported by Sikhism

Classic theism supports a God which is all-knowing, all-powerful and omnipresent. This is also the same for Sikhism.

"The Knower knows everything; He understands and contemplates. By His creative power, He assumes numerous forms in an instant. One whom the Lord attaches to the Truth is redeemed. One who has God on his side is never conquered. His Court is eternal and imperishable; I humbly bow to Him. | |4| |" (SGGSJ, p.518)

"I am Your humble servant, Lord; Your Praises are pleasing to my mind. The Lord, the Primal Being, the Master of the poor, does not ordain that they should be oppressed. | |1| |O Qazi, it is not right to speak before Him. | |1| |Pause| |Keeping your fasts, reciting your prayers, and reading the Kalma, the Islamic creed, shall not take you to paradise. The Temple of Mecca is hidden within your mind, if you only knew it. | |2| |That should be your prayer, to administer justice. Let your Kalma be the knowledge of the unknowable Lord. Spread your prayer mat by conquering your five desires, and you shall recognize the true religion. | |3| |Recognize Your Lord and Master, and fear Him within your heart; conquer your egotism, and make it worthless. As you see yourself, see others as well; only then will you become a partner in heaven. | |4| |The clay is one, but it has taken many forms; I recognize the One Lord within them all. Says Kabeer, I have abandoned paradise, and reconciled my mind to hell. | |5| |4| |17| |" (SGGSJ, p.480)

4.6.2 Monotheism is supported by Sikhism

This is the idea that God is essentially One and is supported by the fact that the Sikh scripture starts with a number and not a word. The number is 1.

"He is the One and Only; O Siblings of Destiny, He is the One alone. | | 1 | | Pause | | He Himself kills, and He Himself emancipates; He Himself gives and takes. He Himself beholds, and He Himself rejoices; He Himself bestows His Glance of Grace. | | 2 | | Whatever He is to do, that is what He is doing. No one else can do anything. As He projects Himself, so do we describe Him; this is all Your Glorious Greatness, Lord. | | 3 | | " (SGGSJ, p.350)

"The works which You have done, O Lord, could only have been performed by You. That alone happens in the world, which You, O Master, have done. I am wonderstruck beholding the wonder of Your Almighty Creative Power. I seek Your Sanctuary - I am Your slave; if it is Your Will, I shall be emancipated." (SGGSJ, p.521)

"The entire Universe is the form of the One Lord. He Himself is the trade, and He Himself is the trader. | | 1 | | How rare is that one who is blessed with such spiritual wisdom. Wherever I go, there I see Him. | | 1 | | Pause | | He manifests many forms, while still unmanifest and absolute, and yet He has One Form. He Himself is the water, and He Himself is the waves. | | 2 | | He Himself is the temple, and He Himself is selfless service. He Himself is the worshipper, and He Himself is the idol. | | 3 | | He Himself is the Yoga; He Himself is the Way. Nanak's God is forever liberated. | | 4 | | 1 | | 6 | | " (SGGSJ, p.803)

4.6.3 Monolatry is supported by Sikhism

This is worship of a deity independent of ontology. For example, the name Allah was used by the ancient pagan arabs to worship their unique deity. However, in the Guru Granth Sahib this understanding of the word Allah finds no place and instead it is simply used to refer to the one eternal being and not a specific demi god.

"O Baba, the Lord Allah is Inaccessible and Infinite." (SGGSJ, p.53)

"He is Allah, the Unknowable, the Inaccessible, All-powerful and Merciful Creator." (SGGSJ, p.64)

"The Muslim God Allah and the Hindu God Paarbrahm are one and the same. | | 5 | | 34 | | 45 | | " (SGGSJ, p.897)

4.6.4 Henotheism is supported by Sikhism

This is acknowledgement of the idea that there are many deities and demi gods. However there is only one worthy of worship which is the great commander of all these other personalities.

"The demons speak, the demi-gods speak." (SGGSJ, p.6)

"Many millions are the demi-gods, demons and Indras, under their regal canopies." (SGGSJ, p.276)

"In the Fear of God, the Siddhas exist, as do the Buddhas, the demi-gods and Yogis." (SGGSJ, p.464)

"They call themselves silent sages, Yogis and scholars of the Shaastras, but Maya has has them all under her control. The three gods, and the 330,000,000 demi-gods, were astonished. | | 1 | | The power of Maya is pervading everywhere. Her secret is known only by Guru's Grace - no one else knows it. | | 1 | | Pause | | " (SGGSJ, p.499)

4.6.5 Deism is partly supported by Sikhism

In terms of what we receive in life (blessings and sufferings), it is solely due to our actions either in this life or a previous life. God does not punish people or bring destruction to the earth to teach humanity a lesson. So in this sense the Sikh concept of God is partly deistic.

"Dadda: Do not blame anyone else; blame instead your own actions. Whatever I did, for that I have suffered; I do not blame anyone else. | |21 | |" (SGGSJ, p.433)

"He Himself creates, and He Himself supports. He Himself causes all to act; He takes no blame Himself. | |1 | |He Himself is the teaching, and He Himself is the teacher. He Himself is the splendor, and He Himself is the experiencer of it. | |1 | |Pause | |He Himself is silent, and He Himself is the speaker. He Himself is undeceivable; He cannot be deceived. | |2 | |He Himself is hidden, and He Himself is manifest. He Himself is in each and every heart; He Himself is unattached. | |3 | |He Himself is absolute, and He Himself is with the Universe. Says Nanak, all are beggars of God. | |4 | |2 | |7 | |" (SGGSJ, p.803)

However, the Sikh scripture also says that God cares for His creation and takes care of it.

"Men, trees, sacred shrines of pilgrimage, banks of sacred rivers, clouds, fields, islands, continents, worlds, solar systems, and universes; islands, continents, worlds, solar systems, and universes; oceans, mountains, and all beings - O Nanak, He alone knows their condition. O Nanak, having created the living beings, He cherishes them all. The Creator who created the creation, takes care of it as well. He, the Creator who formed the world, cares for it. Unto Him I bow and offer my reverence; His Royal Court is eternal. O Nanak, without the True Name, of what use is the frontal mark of the Hindus, or their sacred thread? | |1 | |" (SGGSJ, p.467)

4.6.6 Monism is supported by Sikhism

This is the belief that everything is fundamentally one.

"The God-conscious being is himself the Formless Lord. The glory of the God-conscious being belongs to the God-conscious being alone. O Nanak, the God-conscious being is the Lord of all." (SGGSJ, p.274)

"Your colour is not known, and Your form is not seen; who can contemplate Your Almighty Creative Power? You are contained in the water, the land and the sky, everywhere, O Lord of unfathomable form, Holder of the mountain. | |3 | |All beings sing Your Praises; You are the imperishable Primal Being, the Destroyer of ego. As it pleases You, please protect and preserve me; seroant Nanak seeks Sanctuary at Your Door. | |4 | |1 | |" (SGGSJ, p.670)

"Whatever is seen, is Your form, O treasure of virtue, O Lord of the Universe, O Lord of incomparable beauty. Remembering, remembering, remembering the Lord in meditation, His humble seroant becomes like Him." (SGGSJ, p.724)

4.6.7 Pantheism is supported by Sikhism

"Forming His creatures, He placed Himself within them; the Creator is unattached and infinite." (SGGSJ, p.937)

"In stationary life forms, moving beings, worms, moths and within each and every heart, the Lord is contained." (SGGSJ, p.988)

"Through and through, the Formless Lord is woven into each and every heart." (SGGSJ, 518)

"You are in all colors and forms; he alone is forgiven, upon whom You bestow Your Glance of Grace. | |1 | |Pause | |" (SGGSJ, p.355)

“Permeating all, He is the One. Through and through, He pervades in form and color. He is revealed in the Company of the Holy.” (SGGSJ, p.287)

“In all forms, He Himself is pervading. Through all eyes, He Himself is watching. All the creation is His Body. He Himself listens to His Own Praise. The One has created the drama of coming and going. He made Maya subservient to His Will. In the midst of all, He remains unattached. Whatever is said, He Himself says. By His Will we come, and by His Will we go. O Nanak, when it pleases Him, then He absorbs us into Himself. ||6||” (SGGSJ, p.294)

4.6.8 Panentheism is supported by Sikhism

“In all forms, He Himself is pervading. Through all eyes, He Himself is watching. All the creation is His Body. He Himself listens to His Own Praise. The One has created the drama of coming and going. He made Maya subservient to His Will. In the midst of all, He remains unattached. Whatever is said, He Himself says. By His Will we come, and by His Will we go. O Nanak, when it pleases Him, then He absorbs us into Himself. ||6||” (SGGSJ, p.294)

“In the realm of land, and in the realm of water, Your seat is the chamber of the four directions. Yours is the one and only form of the entire universe; Your mouth is the mint to fashion all. ||1|| O my Lord Master, Your play is so wonderful! You are pervading and permeating the water, the land and the sky; You Yourself are contained in all. ||Pause|| Wherever I look, there I see Your Light, but what is Your form? You have one form, but it is unseen; there is none like any other. ||2|| The beings born of eggs, born of the womb, born of the earth and born of sweat, all are created by You. I have seen one glory of Yours, that You are pervading and permeating in all. ||3|| Your Glories are so numerous, and I do not know even one of them; I am such a fool - please, give me some of them! Prays Nanak, listen, O my Lord Master: I am sinking like a stone - please, save me! ||4||4||” (SGGSJ, p.596)

4.6.9 Monistic Theism is supported

This combines monism, pantheism and a personal god.

“Many are His forms; many are His colors. Many are the appearances which He assumes, and yet He is still the One. In so many ways, He has extended Himself. The Eternal Lord God is the One, the Creator. He performs His many plays in an instant. The Perfect Lord is pervading all places. In so many ways, He created the creation. He alone can estimate His worth. All hearts are His, and all places are His. Nanak lives by chanting, chanting the Name of the Lord. ||4||” (SGGSJ, p.284)

4.6.10 Substance Monotheism is supported (gods are different forms of the same underlying reality)

“He Himself is the pen, and He Himself is the scribe; He Himself inscribes His inscription. ||1|| O my mind, joyfully chant the Name of the Lord. Those very fortunate ones are in ecstasy night and day; through the Perfect Guru, they obtain the profit of the Lord's Name. ||Pause|| The Beloved Himself is the milk-maid and Krishna; He Himself herds the cows in the woods. The Beloved Himself is the blue-skinned, handsome one; He Himself plays on His flute. The Beloved Himself took the form of a child, and destroyed Kuwalia-peer, the mad elephant. ||2|| The Beloved Himself sets the stage; He performs the plays, and He Himself watches them. The Beloved Himself assumed the form of the child, and killed the demons Chandoor, Kansa and Kaysee. The Beloved Himself, by Himself, is the embodiment of power; He shatters the power of the fools and idiots. ||3|| The Beloved Himself created the whole world. In His hands He holds the power of the ages.” (SGGSJ, p.606)

4.6.11 A Personal God who answers prayers is supported by Sikhism

“So humbly bow forever to that Lord and Master. | | 1 | | Meditate on such a God in your mind. He shall be your help and support everywhere, in good times and bad. | | 1 | | Pause | | The beggar and the king are all the same to Him. He sustains and fulfills both the ant and the elephant. He does not consult or seek anyone's advice. Whatever He does, He does Himself. | | 2 | | No one knows His limit. He Himself is the Immaculate Lord. He Himself is formed, and He Himself is formless. In the heart, in each and every heart, He is the Support of all hearts. | | 3 | | Through the Love of the Naam, the Name of the Lord, the devotees become His Beloveds. Singing the Praises of the Creator, the Saints are forever in bliss. Through the Love of the Naam, the Lord's humble servants remain satisfied. Nanak falls at the feet of those humble servants of the Lord. | | 4 | | 3 | | 5 | | ” (SGGSJ, p.863)

“Some form alliances with friends, children and siblings. Some form alliances with in-laws and relatives. Some form alliances with chiefs and leaders for their own selfish motives. My alliance is with the Lord, who is pervading everywhere. | | 1 | | ” (SGGSJ, p.366)

“No one knows the state of the Lord. The Yogis, the celibates, the penitents, and all sorts of clever people have failed. | | 1 | | Pause | | In an instant, He changes the beggar into a king, and the king into a beggar. He fills what is empty, and empties what is full - such are His ways. | | 1 | | He Himself spread out the expanse of His Maya, and He Himself beholds it. He assumes so many forms, and plays so many games, and yet, He remains detached from it all. | | 2 | | Incalculable, infinite, incomprehensible and immaculate is He, who has misled the entire world. Cast off all your doubts; prays Nanak, O mortal, focus your consciousness on His Feet. | | 3 | | 1 | | 2 | | ” (SGGSJ, p.537)

4.7 Summary on the Sikh concept of God

The Sikh God uses a quantum concept of Nirgun-Sargun and supports a large number of traditional God theories.

5 Proving the Existence of God

This next section looks at God by examining 5 traditional tools formulated by Thomas Aquinas.

The first and more manifest way is the argument from motion. It is certain, and evident to our senses, that in the world some things are in motion. Now whatever is in motion is put in motion by another, for nothing can be in motion except it is in potentiality to that towards which it is in motion; whereas a thing moves inasmuch as it is in act. For motion is nothing else than the reduction of something from potentiality to actuality. But nothing can be reduced from potentiality to actuality, except by something in a state of actuality. Thus that which is actually hot, as fire, makes wood, which is potentially hot, to be actually hot, and thereby moves and changes it. Now it is not possible that the same thing should be at once in actuality and potentiality in the same respect, but only in different respects. For what is actually hot cannot simultaneously be potentially hot; but it is simultaneously potentially cold. It is therefore impossible that in the same respect and in the same way a thing should be both mover and moved, i.e. that it should move itself. Therefore, whatever is in motion must be put in motion by another. If that by which it is put in motion be itself put in motion, then this also must needs be put in motion by another, and that by another again. But this cannot go on to infinity, because then there would be no first mover, and, consequently, no other mover; seeing that subsequent movers move only inasmuch as they are put in motion by the first mover; as the staff moves only because it is put in motion by the hand. Therefore it is necessary to arrive at a first mover, put in motion by no other; and this everyone understands to be God.

The second way is from the nature of the efficient cause. In the world of sense we find there is an order of efficient causes. There is no case known (neither is it, indeed, possible) in which a thing is found to be the efficient cause of itself; for so it would be prior to itself, which is impossible. Now in efficient causes it is not possible to go on to infinity, because in all efficient causes following in order, the first is the cause of the intermediate cause, and the intermediate is the cause of the ultimate cause, whether the intermediate cause be several, or only one. Now to take away the cause is to take away the effect. Therefore, if there be no first cause among efficient causes, there will be no ultimate, nor any intermediate cause. But if in efficient causes it is possible to go on to infinity, there will be no first efficient cause, neither will there be an ultimate effect, nor any intermediate efficient causes; all of which is plainly false. Therefore it is necessary to admit a first efficient cause, to which everyone gives the name of God.

The third way is taken from possibility and necessity, and runs thus. We find in nature things that are possible to be and not to be, since they are found to be generated, and to corrupt, and consequently, they are possible to be and not to be. But it is impossible for these always to exist, for that which is possible not to be at some time is not. Therefore, if everything is possible not to be, then at one time there could have been nothing in existence. Now if this were true, even now there would be nothing in existence, because that which does not exist only begins to exist by something already existing. Therefore, if at one time nothing was in existence, it would have been impossible for anything to have begun to exist; and thus even now nothing would be in existence — which is absurd. Therefore, not all beings are merely possible, but there must exist something the existence of which is necessary. But every necessary thing either has its necessity caused by another, or not. Now it is impossible to go on to infinity in necessary things which have their necessity caused by another, as has been already proved in regard to efficient causes. Therefore we cannot but postulate the existence of some being having of itself its own necessity, and not receiving it from another, but rather causing in others their necessity. This all men speak of as God.

The fourth way is taken from the gradation to be found in things. Among beings there are some more and some less good, true, noble and the like. But "more" and "less" are predicated of different things, according as they resemble in their different ways something which is the maximum, as a thing is said to be hotter according as it more nearly resembles that which is hottest; so that there is something which is truest, something best, something noblest and, consequently, something which is uttermost being; for those things that are greatest in truth are greatest in being, as it is written in *Metaph. ii*. Now the maximum in any genus is the cause of all in that genus; as fire, which is the maximum heat, is the cause of all hot things. Therefore there must also be something which is to all beings the cause of their being, goodness, and every other perfection; and this we call God.

The fifth way is taken from the governance of the world. We see that things which lack intelligence, such as natural bodies, act for an end, and this is evident from their acting always, or nearly always, in the same way, so as to obtain the best result. Hence it is plain that not fortuitously, but designedly, do they achieve their end. Now whatever lacks intelligence cannot move towards an end, unless it be directed by some being endowed with knowledge and intelligence; as the arrow is shot to its mark by the archer. Therefore some intelligent being exists by whom all natural things are directed to their end; and this being we call God.

6 Common Questions about God

6.1 *Do the evils in this world weaken our faith in God, or strengthen it?*

For some people, lots of bad things happening to people in their lives can turn a believer into a non-believer. However Sikh history is replete with examples of people going through untold hardship and still keeping a deep and firm faith in God.

One of the best examples is Guru Arjan Dev Ji who was tortured for 5 days and 5 nights including having to sit on a red hot plate and being boiled alive. While this painful treatment was being given the Guru simply repeated the mantra, "Oh Lord whatever you do is sweet to me"

6.2 *If God is good, why did he make humans fallible, able to choose wrong?*

We need to be able to have choice in our lives so that we can consciously choose to grow spiritually and enjoy the sublime essence of Naam. If choice did not exist then we would simply be robots.

6.3 *What does God say about the way we use his creation?*

God made planets like Earth as places for practicing dharma. Humans have a responsibility of using the Earth's resources responsibly.

6.4 *How can God be distant to one person, but near to another?*

This is related to the person's Karma and their understanding of life. Some people have bad experiences with religion and so turn away from both religion and also unfortunately God. Other people believe that science can answer all their questions and so find little room for God. Thirdly some people have too many unanswered questions about God and do not know how to build a personal relationship with Him so they feel a distance from the creator.

6.5 *If everything has God inside, then why is there evil?*

The ability to carry out evil or bad things is within every human being and is simply one or more of the 5 evils taking over a person and creating bad seeds of thought, word and action. However, even the worst human beings have God within but unfortunately they are blind to the light. There is no such thing as absolute evil.

7 Challenges to the Sikh concept of Nirgun-Sargun God

Some zealous members of the Muslim community have attempted to show that the Sikh teachings regarding God are contradictory and that a principle called the universal law of non-contradiction can be used to prove that the Sikh concept of God is fundamentally flawed.

The full essay can be read at the following website:

http://www.geocities.com/islam_sikhism/

The first point to note when using rationality or the universal law of non-contradiction to explore the nature of God is that we must satisfy an important pre-requisite. The pre-requisite is to show that God exists using rationality and the universal law of non-contradiction. If this first step is not

possible then to move on to try and determine the validity of God nature using the same tools is ridiculous.

Okay so let's see where we get shall we?

God is usually described as all-knowing, all-pervading being but this in itself is a wholly impossible concept as it is not logical for something to have all those characteristics at the same time. The existence of God would violate the universal law of non-contradiction because according to this law one thing can not be at more than one place at one time. So God's existence failed the "universal law test" and yet some Muslims used this law to prove the inadequacy of God's nature in Sikh thought!

7.1 *Quantum Physics and Nirgun-Sargun*

One of the important aspects of the universal law of non-contradiction is that it can only be applied to things which are visible. The significance of this point becomes apparent when we explore quantum physics

Quantum physics is the science which explains how matter behaves at very small levels. Quantum physics has completely changed our understanding of matter and the mind and is a science which is creating the next generation of technologies.

7.1.1 The Empirical Evidence of Quantum Physics

Most people, when presented with the theories of quantum mechanics, either don't understand them or don't believe them (or both). So we're not going to present the theories yet: we're just going to start by reporting experimental results.

What we're going to do, in this section, is the double-slit experiment with a twist. Use a very, very dim source of light; and replace the back wall with a photographic plate, monitored by a computer. The result is that at any given moment, very little light is hitting the wall; but the computer can tell you exactly what light hit where, when. And over time, the photographic plate will become a permanent record of all the light that has hit it. When you do the experiment this way, you find that one little point of light is hitting the wall at a time. A little blotch of light here, then a little blotch of light there, with a small but measurable delay between them, and the "pattern" on the wall emerging only after many different blotches have hit. In a pure wave theory of light, this result would be baffling. But with a particle view, it makes perfect sense: we see that we are actually shooting out, and measuring, one photon at a time. Thus, the double-slit experiment actually proves the particle theory of light. But even this is contradicted when we observe the results!

Start with the single-slit experiment. You shoot one photon, it goes through the slit, and it hits the wall. It doesn't leave a "pattern" of any kind, just one little blotch. The next photon hits someplace else, leaving another blotch. After a lot of photons have hit the wall, a pattern starts to emerge, and it is the familiar single-slit pattern. There is a bright white bar behind the slit, where a lot of photons hit – and then, as you move away, it gets dimmer, because fewer photons have hit. So overall, the photons seem to be acting like particles. But of course, we already knew that the single-slit experiment yields basically the same result with both particles and waves, so we haven't really learned much here.

The interesting stuff comes, when we try it with two slits. Once again, we see one photon blotch, and then another, and then over time a pattern emerges. But is it the characteristic "particle pattern" or the "wave pattern"?

The answer is, it is the wave pattern: bands of light (where a lot of photons hit) alternate with dark bands (where very few photons hit). This makes sense if you remember that the photons are actually the components of light. So this is identical to the original double-slit experiment with light, only slower.

But there is a deep theoretical problem here that you may have spotted. Why did we get dark bands? The original explanation was that the light from one slit was interfering with the light from the other slit, effectively cancelling each other out at those points. That made sense because light was continually streaming through both slits. In this case, only one photon has gone through at a time – so what could have interfered with it?

This is why it doesn't help to say light is "a wave made of particles." Waves show interference patterns because one part of the wave (that went through the first slit) interferes with another part (that went through the second slit). Once you do the experiment one particle at a time there doesn't seem to be anything left to make an interference pattern with.

Please pause for a second, because we are – right now – at the most crucial point in this experiment. Everything hinges on your ability to understand how utterly nonsensical this result is. To fully appreciate this, put yourself at one spot on the wall, during the single-slit experiment. Most of the photons get blocked by the cardboard, but once in a while, one comes through, and hits the wall. Occasionally a photon hits the wall right where you are.

Now, someone comes along and cuts another slit in the cardboard. Nothing else in the experiment changes. But after a while, you start to notice that no photons are hitting your spot on the wall any more – ever – from either slit. You are apparently on one of the "dark patches." It wasn't dark with only one slit open, but it is dark with two slits open.

Why are no photons hitting this spot any more? Have they stopped going through the original slit entirely – just because a new slit was opened? Or are some of them still going through the original slit, but they aren't then going to your spot – again, just because a new slit was opened? Neither answer makes any sense, and yet it seems that one of them must be true.

Instead of trying to resolve this dilemma with a theory, let's try to solve it with an experiment. We put a measuring device by each slit, that will record when a photon goes through the slit. This way, when a photon hits the wall, we will know which slit it went through, and we can determine if opening up the second slit actually reduced traffic through the first slit, or redirected it. What do we find? Something entirely unexpected – the wave interference pattern is gone. Instead, we just see a simple particle pattern on the wall, with bright bars that get dimmer. There are no dark patches. It doesn't matter how we do the measurement, the result is the same: when we don't know which slit the photons are going through, we get a wave interference pattern. When we do know which slit each photon travelled through, no interference pattern. We will discuss this result in more detail below, but right now we just want to stress that this is not a theory, it's an experimental fact which has been verified many times. Sensible or not, measuring the photon's path changes what it does.

So those are the experimental results. This would be another good time to back up, maybe re-read the section, and think it over. The results are true. Do you understand why they seem paradoxical?

Can you find a good physical theory that might explain them? This DOES violate the universal law of non-contradiction!

7.1.2 Summary of Quantum Theory

In quantum mechanics it is possible for a particle such as an electron to be in two or more different quantum states or "eigenstates" at the same time. These eigenstates correspond to definite, but different, values of a particular quantity such as momentum. However, when the momentum of a particular particle is measured, a definite value is always found - as experiment confirms!

In the conventional or Copenhagen interpretation of quantum theory, the particle in question "collapses" into the eigenstate corresponding to that value, and remains in this state for future measurements. Or, to put it more accurately, those particles that, on measurement, are found to have a particular value of the momentum constitute a new group for future measurements, with properties different from the original group.

So in the above double slit experiment the photon or electrons went through both slits and through no slits, through the left slit and through the right slit all at the same time!

7.1.3 An Example of Quantum Physics

Here is an example suggested by one of the founders of quantum mechanics, Erwin Schrödinger. You set up an experiment where a particle (small enough that quantum mechanical laws matter) has a 50% chance of decaying after an hour. The particle is in a box, and you don't look. After an hour, what is the state of the system? Classically, you would say that the particle has either decayed, or it hasn't, and you'll know when you look. Quantum mechanically, you say that the particle is in an undetermined state – its Y simply says "maybe decayed, maybe not" – and it won't actually decide until you look. The two sound very much alike, but they are different. To make the difference more vivid, you put a cat in the box, with an apparatus that will kill the cat if the particle decays. Now, is the cat in a state of "maybe dead, maybe not," truly an undecided middle ground, until you look?

It sounds as if this conclusion is ridiculous. Or it may sound like this conclusion is meaningless: saying "the cat is half dead/half alive until we check on it" is just a fancy way of saying "the cat is either dead or alive, but we don't know until we look." But remember the experiments we've discussed, and the conclusions we drew. Quantum mechanics says that these two statements are definitively different, and the intuitive one (the cat is either alive or dead, and we just don't know until we look) is wrong. The photon really, genuinely, and importantly, does not have a specific location until we measure one. The cat really isn't alive or dead.

It doesn't seem to make sense. But another school of thought says, why should it make sense? After all, humans evolved in a world of "normal" objects. And we developed a faculty called "intuition" that helped us survive in that world, by helping us predict the effects of our actions. That physical intuition was, and is, a great asset. But perhaps it shouldn't be too surprising that it becomes a liability when we try to apply it to areas that we didn't evolve for. Quantum mechanical laws generally only have measurable effects when applied to things that are too small to see, so we never evolved an understanding of them, so they seem bizarre.

7.1.4 New Technologies based on Quantum Principles

Quantum physics is leading to a new generation of technologies by utilising the nature of matter to exist in many states at the same time. One such technology is quantum computers which again violate the universal law of non-contradiction!

To explain what makes quantum computers so different from their classical counterparts we begin by having a closer look at a basic chunk of information namely one bit. From a physical point of view a bit is a physical system which can be prepared in one of the two different states representing two logical values --- no or yes, false or true, or simply 0 or 1. For example, in today's digital computers, the voltage between the plates in a capacitor represents a bit of information: a charged capacitor denotes bit value 1 and an uncharged capacitor bit value 0. One bit of information can be also encoded using two different polarisations of light or two different electronic states of an atom. However, if we choose an atom as a physical bit then quantum mechanics tells us that apart from the two distinct electronic states the atom can be also prepared in a coherent superposition .of the two states. This means that the atom is both. in state 0 and. state 1. There is no equivalent of this superposition in the classical world, it is a purely quantum mechanical phenomenon. Since we are used to seeing classical physics at work in the every day world, such quantum phenomena often seem counter-intuitive.

Now we push the idea of superposition of numbers a bit further. Consider a register composed of three physical bits. Any classical register of that type can store in a given moment of time only one out of eight different numbers i.e. the register can be in only one out of eight possible configurations such as 000, 001, 010, ... 111. A quantum register composed of three qubits can store in a given moment of time all eight numbers in a quantum superposition .

This is quite remarkable that all eight numbers are physically present in the register but it should be no more surprising than a qubit being both in state 0 and 1 at the same time. If we keep adding qubits to the register we increase its storage capacity exponentially i.e. three qubits can store 8 different numbers at once, four qubits can store 16 different numbers at once, and so on; in general L qubits can store 2^L numbers at once (here 2^L means 2 to the power of L). Once the register is prepared in a superposition of different numbers we can perform operations on all of them. For example, if qubits are atoms then suitably tuned laser pulses affect atomic electronic states and evolve initial superpositions of encoded numbers into different superpositions. During such evolution each number in the superposition is affected and as the result we generate a massive parallel computation albeit in one piece of quantum hardware. This means that a quantum computer can in only one computational step perform the same mathematical operation on 2^L different input numbers encoded in coherent superpositions of L qubits. In order to accomplish the same task any classical computer has to repeat the same computation 2^L times or one has to use 2^L different processors working in parallel. In other words a quantum computer offers an enormous gain in the use of computational resources such as time and memory.

7.2 *Sikhism and Quantum Physics*

Sikhism teaches that God and the creation are one which is very similar to the idea of entanglement in Quantum Physics. The empirical evidences of Quantum physics also highlights the theory of superposition of states as defined by Sikhism in the Nirgun-Sargun quality of matter and God.

Finally coming on to the law on non-contradiction, this is violated in every instance of Quantum Physics when we are not observing the piece of matter at hand. So this leads on to the final statement which is that if it were possible to see God then we could apply the universal law of non-

contradiction, however it is not and so the creation and God will always remain in states of superposition.

Sikhism is truly a dharma of the new age with new ideas for society. People are free to choose religions and philosophies which support age old ideas of life and creation but for those people who want to take their spirituality to the next level, we would recommend Sikhism the Dharma of Service to Humanity.