Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP)

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ABSTRACT:

We argue that science and what is regarded as 'spirituality' need not be entirely separated. We can introduce spirituality into the domain of science by recognizing what is scientifically feasible in our reality, even if it is incomplete, provided it cannot be refuted by being falsifiable. Furthermore, our overt 4 dimensions of physical *experience*, reflects only part of the mainly covert expression of our *existing* 9-dimensional quantized finite reality embedded in an infinite continuity.

To achieve this requires extension in Philosophy of Science to include the Neppe-Close concept of LFAF (Lower Dimensional Feasibility Absent Falsification). This reflects a powerful and necessary redefinition extending Popperian falsification. Moreover, LFAF can be applied by fitting what is feasible in our experience into pieces of a jigsaw puzzle. In effect, we place what is known in our direct *experience* into a broader *existence*, most of which is hidden from us in the framework of our physical world. We can incorporate previously ignored complex concepts like higher consciousness, hidden dimensions, and the infinite impacting us physically.

We first provide the background and a brief outline of the current *status quo* concerning the Neppe-Close TDVP research on:

- The nine Close-Neppe / Neppe-Close discoveries that have completely changed the current conception of the nature of reality;
- Groundbreaking and proven discoveries;
- Key scientific Neppe-Close epiphanous discoveries; and
- Extra pertinent spirituality and science comments perspectives based on empirically verified real-life proofs.

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We emphasize the great importance of several comprehensive necessary but neglected components and philosophical dilemmas in our stable universe.

- The philosophy of *Unified Monism*, reflecting the metaphysical basis of TDVP.
- Kabbalah, and other mystical traditions like Jainism, that support TDVP.
- *Ordropy*, reflecting order in the infinite and also expressed in the finite: Ordropy describes an expanded multidimensional negative entropy including consciousness reflecting organizing principles in science and spirituality.
- Ordropy allows *immortality* in the infinite and explains *physical life* and death.
- Limited free-will and choice, plus the related concepts of good and evil.
- *Dimensional biopsychophysics* in the context of approaching dimensions, infinity, understanding spirituality, consciousness, meaning, math, and the laws of nature.
 - So-called 'junk DNA' being anything but junk. It may be the message that contains consciousness, meaning, information, spirituality, and even Godliness.
 - Prior to the 'Big Bang' or the 'event horizon', there was <u>not</u> just nothing out of which something arose ('ex nihilo'). There's always been an infinite something: the term 'begins' reflects the 'something' of the finite, yet the infinite exists forever, also before the finite. Gimmel preceded the finite allowing for physical existence.
 - The Laws of Nature are unified. This includes one law for the infinite and finite; and a single law for all the quantal, macroreality and cosmological levels.
 - TDVP is loaded with the concepts of impact and influence: These imply theism, i.e. not only the existence of G-d, but the *active potential for interventions*.

Finally, we provide an *Epilogue*, providing a broader perspective as to these findings and how, indeed, science can be unified with the spiritual.

KEYWORDS

9-dimensional; 3S-1t; Atom; Big Bang; Brain; Calculus; Close; Conception; Compatible; Conservation of gimmel; Consciousness; Consciousness research; Content; Cosmology; Cybernetic; Dark Matter and Energy; Dimensional biopsychophysics; Dimensions; Distinction; Domains; Electron; Energy; Empirical; Energyless; Entropy; Essence; Evolution; Extent; Extended consciousness; Feasibility; Feasible; Free-will; Genesis; Gimmel; G-d; God; Groundbreaking discoveries; Impact; Immortality; Infinity; Influence; Information; Intent; Kabbalah; Jainism; Laws of nature; Life; Limited freedom of will; Lower dimensional feasibility, absent falsification; LFAF; Macroworld; Mass; Massless; Materialism; Meaning; Medicine; Mystical; Neppe; Neurological; Neutron; Organizing principles; Order; Ordropy; Paradigm; Philosophy; Physical; Prayer; Precognition; Proof; Proton; Psi; Psychology; Quantal; Reality; Science; Spirituality; Stability; Survival; Transfinite; Third component; Triadic Dimensional Vortical Paradigm; TDVP; Unification; Understanding; Unified monism; Union; Universe; Vortices.

REDEFINING SCIENCE: APPLYING LOWER DIMENSIONAL FEASIBILITY, ABSENT FALSIFICATION (LFAF): SECTION 1

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Making the impossible overlap happen: Could spirituality ever apply the scientific method and become part of science? Yes! We link here spirituality and science through understanding broader concepts. We contradict Gould's forever-separate 'nonoverlapping' magisteria' of Science and Spirituality. Science is based on empirical data, logic and mathematics. Religion is based on belief. They could and would never meet. These separate directions have been an accepted status quo for millennia and would never change. Moreover, given our current Popperian perspective of the Philosophy of Science 2, necessarily requiring falsification, this dichotomy could never be altered. Certainly, spirituality could never join with science until a paradigmatic rethink about the nature of science occurred. That's happened!

LFAF: In 2011, a profound breakthrough occurred in the Philosophy of Science.⁴ The authors, Vernon Neppe and Edward Close proposed a new method of analyzing science: LFAF or Lower-Dimensional Feasibility, ⁴ Absent Falsification. ⁵ This extended the hypotheses in the Philosophy of Science to include logically feasible but unrefuted concepts into science. While almost all concepts in the domain of spirituality could not be falsified using our conventional model, they remained unverified and in the 'not science' category. Neppe and Close then extended the definition and methods of science by adding 'scientific feasibility' to the mix: We could consequently put pieces of a complex, yet incomplete jigsaw puzzle together. This would provide legitimacy even though we would not know exactly where to place all the pieces of the puzzle. A whole new ballgame arose. 6 What we could not definitely falsify in our current physical experience reality suddenly could become feasible if we could legitimately fit even an unrefuted hypothesis into that jigsaw. By so doing, we would be extending science. But we might, nevertheless, only be able to appreciate only some of our physical reality in our current experience of '3S-1t'—3 dimensions of space (length, breadth, height; 3S) in the present moment in time (hence '1t' written in small case). Moving beyond 3S-1t would usually remain hidden to us, though there still might be cogent suggestions of data in higher dimensions, possibly based on math calculations. Those higher dimensions could include the spiritual and the extensions of consciousness, possibly outside the brain.

Higher dimensions: This extension of LFAF to further higher dimensions, recognizes profound change. This is because if the spiritual experience in 3S-1t was not refuted by being falsified, yet proved to be scientifically feasible, it could Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

potentially be part of science. This meant, at times, moving beyond 3S-1t, because that could incorporate a 'consciousness' that we had previously never recognized. This is so as we don't even talk of consciousness in our 3S-1t space-time. However, we could conceptualize moving through higher dimensional levels. We might also realize that we had only been experiencing tiny portions of reality. This would be relative to our 3S-1t reality experience and quite different from our broader extended existence incorporating many other dimensions, consciousness and infinity. This, then is what we had to do, and we did this with a series of editions of our everchanging, ever- growing book, Reality Begins with Consciousness: A Paradigm Shift That Works 7 and hundreds of subsequent publications.

Gimmel: Another profound advance occurred when we discovered a new component to reality. This we called 'gimmel' 8,9 \(\frac{3}{2}\): It can be characterized as a third mass-less energy-less 'substance' or 'ordering agent' or 'process' or 'component' or possibly a 'vehicle of consciousness'. 10 Effectively, gimmel turns out to be the major, indispensable agent for our physical reality. Gimmel unifies the laws of nature as it's in union with every stable particle in the universe. Gimmel is even proven in Dark Matter and Dark Energy correlations ^{11, 12}, and is necessarily in union quantally with every stable subatomic particle. Without gimmel, our physical world and our universe would simply not exist—every particle would fly away as gimmel and makes for stability with the exact amounts of Gimmel TRUE units in quarks and electrons. 13-17 Remarkably, gimmel is not a speculation, it is *mathematically and empirically* proven. ¹⁸ This allows everything in our world and, indeed, in our cosmos, to have the same rules: They must contain protons and electrons, and with the exception of common hydrogen ('Protium'), neutrons. All these subatomic particles must be in union with gimmel, otherwise they are mathematically and physically impossible. ¹⁹ This literally makes materialism as we know it, refuted: Even without knowing about gimmel mathematically the atom with its protons, neutrons and electrons, would simply not fit. However, the concept of gimmel has explained how all fits and has revolutionized science and our thinking. What is it? We propose it's either the special higher 'consciousness' itself or the 'vehicle that carries consciousness': This is why we dare add what is commonly regarded as 'spiritual' to the halls of science.

Feasibility: The LFAF concept includes logically feasible concepts in hypotheses that may not be falsified or even falsifiable in our *experiential* reality of our three dimensions of space embedded in the present moment in time (3S-1t). However, LFAF is applicable at all dimensional levels. Feasibility allows a greater versatility of scientific approach. ^{7 20, 21} This concept of LFAF (Lower Dimensional Feasibility, Absent Falsification) represents a paradigm shift in the Philosophy of Science. LFAF allows a *relative* component to the absolute idea of 'only falsifiable data is scientific'.

3S-1t Hypotheses: Falsifiability is often limited to 3S-1t physical phenomena. But even in conventional 3S-1t physical science, we begin with hypotheses that are not proven through being falsifiable, but are feasible. So we consider them by applying LFAF, as feasibility is a logical first start to examine what we're hoping to falsify. The model of LFAF is sometimes analogously applied by tentatively adding pieces to a jigsaw puzzle based on our experience in 3S-1t, knowing that the rest of our existence is hidden. However, that does not allow for unrestricted license. Information must still be scientifically feasible: the data must show qualities such as being within reason. ^{5,7,20,21} It must be sensible, viable, workable, attainable, realistic, realizable, practical, and reasonable. For example, in civil forensic cases, we carefully examine data: Is it logical? Would a jury of peers regard the information as feasible enough to be 'more likely than not'? Or in criminal cases, would it attain the level of 'beyond reasonable doubt'? This is scientific feasibility in practice. ²²

3S-1t as a piece of reality: *LFAF allows us to recognize that some elements cannot be falsified at this time at all in 3S-1t.* Nevertheless, there may be ample feasibility evidence in 3S-1t that it might be a legitimate piece of a bigger higher dimensional jigsaw puzzle. There is simply a great deal that is covert, and not expressed in our experiential 3S-1t — most consciousness is hidden, often *mystical or spiritual*.

Avoiding Contradictions: We do not, and cannot allow any contradictions in LFAF. ^{7 23} There must not be falsification or even misinformation, and the jigsaw pieces must never contradict empirical evidence. Thus, applying proper feasibility, extends the judgment of falsifiability, because it incorporates incorrect jigsaw pieces. Yet, the correct results might present like single puzzle pieces in a whole, multidimensional (i.e., >3S-1t) puzzle, yet the data only might portray what is observed through the 3S-1t framework. ^{20, 21} Consequently, conclusions may be feasible yet not falsifiable. This way, we can sometimes explain some of the unsolved conundrums of physics because these cannot be directly or completed represented in 3S-1t. ⁷

Applications: By demonstrating the limitations of Popperian ^{2, 3, 24} demands for the falsifiability of science in higher dimensional realities, we apply this 'Lower Dimensional Feasibility—Absent Falsification' (LFAF) approach when it is logically indicated. ⁷Sometimes, we can apply Popperian falsification, though even then feasibility might be much more useful in certain instances, such as in *Medicine* and *Pharmacology*, where double-blind studies, though remaining the key to measure acceptance of research studies, are certainly limited, as indicated, in clinical practice. ²⁵ Do you want to take an antibiotic that is better statistically than placebo but works only in 52% of cases? Or would you base your choice on the feasible but unproven insight of an antibiotic that works in 98% of cases? ²⁵ LFAF is also pertinent in the *Social sciences* and in *Forensic sciences*, ²² where we often seldom have math proof. Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional 11 Vortical Paradigm (TDVP). 10 NJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

Quantal: At times, at the quantal level, unexplained paradoxes occur, when applying 3S-1t. In physics, for example, we cannot explain 'entanglement' ^{26-28,,26, 28, 29} in which two particles are separated in space yet create simultaneous information in time, socalled 'non-locality' ^{20, 21}. But we can explain this feasibly in a 9-dimensional model, and the advent of gimmel which may reflect consciousness, for example, has been particularly important. It is insufficient that laureate Feynman might have shrugged his shoulder and recognized that there are some inexplicable quantum enigmas.³⁰ Such mysteries demand solutions for us to continue scientific progress.

Consciousness Beyond 3S-1t: Consciousness, for example, becomes unexplained when applied only relative to our physical vantage point—our '3S-1t' framework— "it's impossible". But higher dimensions are proven to exist. ⁷ These are likely important in psi research ^{31, 32} and in theology. Moreover, we occasionally directly experience unexplained events from the framework of different "windows of visualizing" likely to be different dimensional domains (e.g., veridical dreams ^{33, 34}). These are glimpses into the 'relatively non-local'. ^{20, 21}However, their occurrence exemplifies contradictions that simply should not exist if it would have been correct that the current 3S-1t paradigm truly reflected all of existence: That itself is falsified— ironically, 3S-1t alone is the one that's impossible ⁷! Moreover, we can feasibly understand altered states of consciousness as reflecting other dimensional states of awareness.³⁵ The unexplained conundrums that defy explanation in physics, for example, may well be solved by another dimensional-consciousness paradigm.

3S-1t Examples: There are some obvious empirically based prejudicial examples requiring LFAF. These were initially unexplained applying purely 3S-1t, and yet were not falsifiable, such as the origins of hypnosis, electricity, X-rays, meteorites, sterilization of bacteria preventing illness, the round earth, the earth revolving round the sun, Einsteinian relativity, warping of reality, splitting the atom, and psi. ^{36, 37} With Popperian falsifiability simply applying 3S-1t, they could been metaphysical, at best. Yet, they had feasible pieces of the jigsaw puzzle and eventually moved from the lower level of certainty, namely, potentially feasible science to 'certainly feasible' and finally to falsifiable and replicated science. This was applying LFAF without even realizing it. And LFAF has allowed studies on multiple dimensions. This may even allow for so-called 'unified field theory' in physics.

Opportunities: LFAF might allow creative explorations, metaparadigms and theories of everything (TOEs) to become legitimate creative scientific endeavors and differentiating them from unscientific concepts. Scientific feasibility allowed the TDVP leaps, ^{38, 39} and also other so-called TOEs could be critiqued. Yet, ironically LFAF, was discovered as a necessity through TDVP being developed. LFAF ^{40, 41} now allows for feasibility as an appropriate method in many disciplines e.g., in Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

cosmology we make feasible assumptions about galaxy events that happened millions or even billions of years ago and are millions of light-years away. We commonly jump into the darkness of dark matter and energy, and we base other assumptions on light from the furthest points of the universe, but we may not be detecting light even further away. But we call these sciences. We think the outer reaches are what we can detect, but there might be much more. ⁴² We didn't realize that in all this, we were applying feasibility in LFAF.

Solving Contradictions: LFAF facilitates detecting possible contradictions in feasibility. A controversial example is re-examining the conventional features regarded as proven in *evolution*: Inter alia, there are sometimes developmental 'jumps' between and within species, and any role of *consciousness* has been ignored. We have to put much unverified but not falsified data ('absent falsification') together when there might be large quantized, discrete jumps in assuming progression and continuity. Could there also be a consciousness in evolution which cannot be detected by 3S-1t logic? Or are we not allowed to even contemplate this?

The Jigsaw Puzzle Hierarchy: Despite always being incomplete 43-45 we build our jigsaw puzzle carefully, one piece at a time. Conventional Popperian scientific method does not recognize extra dimensions, let alone infinity and its implications. And many scientists simply deny that consciousness that envelop space and time: It's a taboo, despite being exposed to it all the time. That denial limits scientific approaches to understanding the nature of reality. Often, too, we have to make assumptions in consciousness research and parapsychology. 43-45 The jigsaw puzzle now includes what for some would be spiritual: Previously considered to be nowhere near scientific, spirituality has become a major recipient as it allows for using our extended methodology in science. In the context of LFAF, we hierarchically apply the jigsaw puzzle. Particularly, when one deals with multi-dimensionality, one has to put together pieces because we're examining relative to our limited 3S-1t experience, yet we don't know where they belong. Placing the exact puzzle piece in the most appropriate position would constitute a higher level of feasibility than just knowing the data fits somewhere in the puzzle. These provide useful starting points to extend science into the mystical, and making the spiritual more scientific. 46

Spirituality: We've extended the model of science from being purely based on what is falsifiable, broadening the range of science, allowing, some previously ignored 'pseudosciences' to become part of our broader science fitting this enlarged conceptualization of science. Recognizing feasibility allows the multidimensional model, with consciousness in its extended form, infinity and spirituality, and the infinite can be conceived of spiritually. This is the indirect consequence of TDVP: allowing feasibility with spiritual ideas.

A PERSPECTIVE ON SCIENCE AND SPIRITUALITY: SECTION 2.

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

Now that we understand how profound LFAF is in inducing changes in our thinking about reality and the world, in 3S-1t as well as higher realities such as the 9-dimensional quantized finite existence that contains 3S-1t, we discuss how science and spirituality are not separate domains but are strongly linked particularly incorporating, too, another level, the infinite continuity that envelops the discrete, quantized finite. This is a landmark breakthrough reflecting a unique paradigm shift, namely the Neppe-Close 'Triadic Dimensional Vortical Paradigm' (TDVP), regarded by many as a Theory of Everything (TOE) that works. {Neppe, 2014 #827;Neppe, 2015 #1144} All these features, the quantized finite volumetric dimensions of not only space, but a space contained in time, and time embedded in a higher consciousness, all form a single unit that obey one law of nature, irrespective of whether it is quantized, macroreality including what we see and hear in our physical world, and the cosmological. But first, let's clarify what we mean by *spiritual*, because that is fundamental to consciousness and that singular infinity extending forever in space, and time, and information.

- 'Spirituality' is one of those terms that is difficult to define: Many would consider it as synonymous with such terms as the transcendent, nonmaterial, higher level beliefs, and mystical: In common use, it might imply some kind of belief in a higher good, stripped of ritual, and a higher-level deity, but *not* defining it synonymously with 'religion'. Some would label spirituality as one aspect of the 'non-physical': that non-physicality might be so, provided that we remember that the spiritual can covertly but regularly impact and influence all of our overtly expressed physical reality.
- The 'spiritual' has not been scientifically recognized because scientists need to apply the concepts of multidimensionality, consciousness, infinity, scientific feasibility, and the transcendent. To make spirituality a science, we would need to apply the scientific method including feasibility, though falsifiability would be rare. We would have to move away from belief to empirical fact and mathematics. This is a formidable challenge, but TDVP, gimmel, 9-dimensional models, allowing for a science of consciousness, and recognizing the math in infinity, helps a great deal.

The authors personally acknowledge a greater reality in their ongoing development of TDVP, a scientific model that many scientists now regard as a profound paradigm shift that can be applied. Much of the TDVP data is difficult to dispute, because in

contrast with just 'feasibility', mathematical logic might be the ultimate method of establishing truth: And TDVP is loaded with this logic and mathematics.

In this paper, we want to ensure that readers understand the basics of the TDVP model. Therefore, we list 24 remarkable, at times, ground-breaking scientific TDVP findings and demonstrating how these discoveries relate to spirituality. These include:

- Materialism at the atomic level is refuted. This allows for conceptualizing spirituality. The refutation is a direct and simple mathematical one in which, for example, we cannot by definition have half an atom: Everything is integral.
- We necessarily exist in a vortical reality. This means we are continuously rotating through finite, quantized, volumetric 9-dimensions, embedded in the infinite. This means that our basic limited 3S-1t experiences are incomplete. There is more and the remaining dimensions are all part of the same essence.
- This infinite continuity plays a critical role in existence, life, and order. The awareness of order as opposed to disorder, might imply something higher. And the application of TDVP necessitates an existence that is never-ending—we are immortal, and this, too, for many, is a fundamental part of spirituality.
- Gimmel, a third agent besides mass and energy, is in union ^{9, 10} with all stable particles and atoms with mass and energy: We have even somewhat humorously called it the 'God Matrix', because it certainly is far more deserving than the so-called ephemeral, unstable Higgs Boson, referred to as the 'God Particle'. ⁹ Gimmel is necessary for the stability of atoms and of our cosmos. The awareness of this remarkable advance, which necessarily stabilizes our world, and is also a useful way of understanding infinity, certainly increases the jigsaw puzzle pieces for a science in spirituality.
- Triadic Rotational Units of Equivalence (TRUE) are a necessary pattern in our 'triadic' nature. Everything fundamentally is mathematically in threes. TRUE includes measuring the amounts of TRUE units in gimmel, mass and energy.^c
- The laws of nature are unified. This could imply a creator.
- By extending our scientific boundaries by applying feasibility, what is interpreted as spiritual or transcendent, may become more scientifically comprehensible.
- TDVP is a theory of everything that works, again reflecting a potential unification of reality.
- Mathematical logic is the central feature of reality, involving empirical proof. It is not just as an 'operator' for calculations. It reflects possibly on a mystical unity.
- TDVP is loaded with the concepts of impact and influence: These imply theism, i.e. not only the existence of G-d, but the *active potential for interventions*.

^c TRUE is the new Close-Neppe technique for analyzing gimmel and chemicals including the elements. *Neppe, VM; Close ER.* **Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP)**. *IQNJ.* 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

These explanations of TDVP, logically lead to us discussing some major significant topics linked with TDVP.

Let's glimpse at some highlights in regard to spirituality:

- Consciousness is a key. However, two components of the Close-Neppe Calculus of Dimensional Distinctions recognizing the active roles of influencing and impacting through prayer interventions are critically relevant.
- The wondrous findings pertaining to **gimmel**, allows stability in the universe. Gimmel is revealed as a massless, energyless third component in union with mass and energy. However, gimmel appears to be the missing aspect providing order to our universe, and linking with the infinite. Gimmel appears to be the mystical and spiritual piece we've been seeking in unifying science and spirituality.
- **Unified Monism**: Unified Monism (UM) derives directly from the scientific TDVP findings. This unique mind-body model involves unification of everything and implies major spiritual implications, yet UM works even in our physical reality: The infinite enveloped in the finite, unify one essence.
- **Kabbalic mysticism** exemplifies some of the remarkable links of science and philosophies pertaining to spirituality; and yet it parallels many aspects of TDVP. One highlight is the first three verses of Genesis. However, the unification of the laws of nature is paradigmatic. Kabbalah is remarkable: But Jainism too can be partly applied.
- **Order in our world:** The neglected area of *order and ordropy* shows why the exclusively finite concept of entropy is incomplete: The concept of conservation of gimmel means that nothing is lost in our world, also implying that immortality is important. The link is the application of infinity to TDVP.
- **Limited freedom of will** is highly compatible with spirituality. In TDVP, multidimensional time allows recognition of precognition statistically, yet allows for free-will, and choosing **good or evil**.
- **Dimensional biopsychophysics** is the new discipline the authors introduced, applying, inter alia, the TDVP concepts of higher dimensions, infinity, meaning, and understanding in spirituality, and the underlying laws of nature.
- Finally, we include a summary perspective Epilogue.

And throughout this discussion, we emphasize the major thread: *Is it feasible to regard the spiritual as part of science? The Neppe-Close Lower dimensional feasibility, absent falsification (LFAF) concept of feasibility in science allows for this, and it is critical for expanding science and the spiritual.* ⁶

We've now provided a priority perspective: The sections that follow demonstrate that science is not only perfectly compatible with the spiritual, but that the two disciplines can contribute further to one another.

BACKGROUND TO SPIRITUALITY AND SCIENCE: SECTION 3

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

The well-known mainstream physicist, Stephen Hawking ⁴⁷⁻⁵⁰ tried to develop a 'Theory of Everything' (TOE). We argue, controversially, that he left out three major, critically important features: *Consciousness, extra dimensions and infinity*. But Hawking is not alone. Of the twenty-six known attempts to develop theories of everything, very few include even these three features. Add the scientific approach, and there are two left. Furthermore, Albert Einstein's clarity appears to be pertinent: "I *want to know God's thoughts—the rest is just details.*"

Even more so, Albert Einstein pointed out that:

"Science without religion is lame. Religion without science is blind." ⁵¹ So, could we reconcile science with religion? And as scientists dare we say anything? Moreover, should we include or even consider, God? ... Is that scientific heresy?

Max Planck, Nobel Laureate and discoverer of quantum physics, believed that there is an infinite intelligence behind the phenomena that make up the observable universe. We're very much indebted to these two great men, who dared break the barrier into the spiritual aspects of reality, because besides the scientific method itself, 'spirituality' is the fifth feature that must be added to the current paradigm, and all five must be *developed from empirical data and proved mathematically*.

We have applied 'LFAF' (Lower Dimensional Feasibility Absent Falsification) as a new definition of science including feasibility. ⁷ This can introduce spirituality particularly as one moves beyond 3S-1t to dimensional and infinite concepts and this allows it to *potentially* enter the domain of science.

Einstein, himself, didn't seek a theory of everything until the last twenty years of his life, but he supported the right path of extra dimensions. He adapted Hermann Minkowski's 4-dimensional space-time as the geometry of relativity ⁵²⁻⁵⁵: The theory of relativity has been successful to a large extent because the mathematics of 4-dimensional geometry more closely reflects reality than does the mathematics of 3-dimensional geometry. ^{55 56} We know now that reality is multidimensional, and consciousness, as experienced mentally, is the doorway to these extra dimensions.

Several other physicists—notably Oskar Klein, Theodor Kaluza and Wolfgang Pauli ⁵⁷⁻⁵⁹— carried this line of reasoning further by using 5-dimensional models and they had success; but for several reasons they didn't go farther with this. Their contributions to a powerful new paradigm were in the recognition of extra

dimensions. ⁷ Furthermore these prior quantum physics models fail to adapt fully to the empirical fact that even the four-dimensional (3S-1t) physical reality we live in is quantized—it's made up of *discrete* elements, like pixels on a TV or bits on a computer, but these components are actually *three dimensional—they're volumetric*. Rauscher and Targ extended this and even used an 8-dimensional model and recognized consciousness, but not infinity. ⁶⁰

So besides the fundamental four features we've emphasized are needed for a prevailing complete metaparadigm ⁷—a perfect theory of everything encompassing multiple specialties—namely, *extended consciousness*, *extra dimensions*, *infinity*, *and science*, we must possibly now add *volumetric quantization* of the *finite* reality, where everything is discrete, and as a *scientific endeavor*, the *spiritual*, which partly involves an *unbreakable infinite continuity enveloping the finite*. ⁷

The most studied multidimensional model, 'String Theory', with its many different variants, including superstrings ⁶¹⁻⁶⁶ has become very popular, and thousands of physicists have worked with it, but it has not yielded very much. All the variants remain 'theories'. However, again, no string theories recognize consciousness; time is barely involved; and certainly not infinity. The most successful of current string theories allows us to appreciate multiple extra dimensions, but string theory models have failed to relate the nature and structure of these extra dimensions of reality to the nature and structure found in pure mathematics: Ad hoc foldings or curlings of extra dimensions do not work. Yet it turns out that multi-dimensional vortices with spinning movements in at least three dimensions and moving through 9 quantized finite dimensions, as in TDVP, do work.

Additionally, extra dimensions are necessary in order to explain quantum mechanics. That, too, is now part of advanced TDVP thinking. But of course, models have to be empirically and mathematically sound too. Other than TDVP, none of the 26 models evaluated have proven to be so.

The Triadic Dimensional Vortical Paradigm model developed in 2011 by the authors, Dr. Vernon Neppe and Dr. Edward Close ^{7, 67}, has filled all these criteria. In fact, in their initial analysis of 24 models applying 39 stringent criteria for a Theory of Everything, the TDVP model scored a perfect 39/39, more than double the score of any competitor other than the still flawed original Neppe (29/39) and Close (23/39) models. ^{39, 68, 69} TDVP now scores a perfect 62/62 ⁶⁷.

This is why we have used this work in our exploration of Science in Spirituality. *TDVP appears to work, and to approach spirituality by applying science.*

The unification of science and spirituality 9, 70-72

There is no logically consistent way to merge the usual physical 3S-1t ^d experience alone with spirituality. They are quite separate in a 4-D space-time model as 3S-1t does not contain a symbolic representation of consciousness: Consciousness requires a higher dimensional representation than Space and Time.

Nevertheless, when we extend the scientific model to a mathematically required 9-dimensional domain, and also to include infinity, the results are crucially different. This new approach to science, as indicated, can be accomplished by applying the new technique of LFAF and by so doing amplifying scientific feasibility ^{5, 40, 41, 73, 6}. The spiritual then fits, unlike the idea of Gould's Magisteria where science and spirituality were perceived as fundamentally different categories of things. ¹

The likelihood increases that the TDVP model is broadly correct with each discovery. And this has been repeated over nearly a decade now, yet it is largely unchallenged and never been disproved. Yet, sadly, but not surprisingly, this is the typical history of groundbreaking endeavors.

The Neppe-Close TDVP contributions have been largely ignored by many colleagues: with excuses such as "it's too difficult", "I'm not so trained", and "it's too wrong to be wrong", or Wolfgang Pauli's famous response to his then student, later eminent physicist, Victor Weisskopf (translated to) "This is not even wrong". ⁷⁴

These kinds of comments reflect the onset of the typical Thomas Kuhnian progression, describing how *scientific revolutions* begin with denial of what is not 'normal science'—new, 'unscientific' ideas—then much later, the final, fifth phase concludes with acceptance of new norms ⁷⁵. Kuhn described the 5 stages as:

'1. The pre-paradigm phase; 2. Normal Science; 3. Crisis Phase; 4. Paradigm Shift; and 5. Post-revolution.'

In 2016, this Kuhnian Revolutions Model was extended by Neppe and Close ^{76, 77} into the '11 Neppe-Close Revolutions model' (11NCR). 11NCR filled in gaps and the extended 11NCR has a particular emphasis on Kuhn's middle phases 2 through 4. 11NCR describes the scientists' progression in their stages of understanding of the revolutions of change—the reshaping of science—by adding several more stages along the way from Phase 3 to Phase 5, producing eleven key periods of adjustment. (p12), 77, 78 Arthur Koestler summarized the situation well, and we quote here, without meaning to offend, because it's logical to be careful with new data, and even to reject the ideas, but only after thorough evaluation:

d 3 dimensions of space (length, breadth, height) in a moment in time (the present). Our experience is usually restricted 3S-1t (e.g. we cannot directly experience X-rays or gamma rays or ultrasound or mechanoreception in spiders).

Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

"Innovation is a two-fold threat to academic mediocrities: it endangers their oracular authority; and it evokes the deeper fear that their whole laboriously constructed intellectual edifice may collapse." ⁷⁹

Persuasion of others is indeed difficult. But unifying science and spirituality is a major and critically important task.

We begin then with the major prevailing concept today in science, which is one of Gould's 'Non-overlapping magisteria' in which science and religion each represent different areas of inquiry, fact vs. values. In Gould's model, the two domains do not overlap. ^{1,80}. In this paper, we oppose this view based on the findings of empirical science and mathematics. We argue that applying our TDVP model and examining the data, we can often confirm that the spiritual is valuable as an addition to understanding science.

<u>Science and neutrality: Does TDVP constitute a legitimate exception with the inclusion of spirituality?</u>

We are discussing the linkage of *science and spirituality*. More specifically, TDVP must then be perceived as having meaning and purpose. Despite it being a scientific model—and it could be argued science should be neutral—the discovery of gimmel ¹⁰, and of extra higher dimensions embedded in infinity may be envisioned as involving a mystical component. Additionally, gimmel might be considered as a non-physical, previously-undiscovered third agent; the extra dimensions besides 3S-1t have parallels with the Kabbalah ⁸¹ and other mystical traditions; and the infinite has been a largely unexplored realm in mathematical physics.

Moreover, the significant purpose of TDVP could be argued to be more than just a more comprehensive scientific model: it is a *paradigm shift*, allowing a certain latitude in classifying where it fits. The higher dimensional domains are different from the physical world we perceive with the limited senses. These higher *dimensions* involving *consciousness* ultimately lead to an *infinite domain* creating a unique triad in the 'theories of everything'.

Moreover, we are dealing with distinctions—a logical, mathematical calculus of distinctions 82-84;18, 85-94—that emphasize *impact*, and therefore emphasize change. And that change in *influence* might introduce a significant change to *theism*—a divinity that acts, as opposed to a *deistic divinity* who creates and then has no involvement.

So though science should be *neutral*, TDVP perceives a meaningful progression—a progression at a higher dimensional level with a higher consciousness—ultimately *Neppe, VM; Close ER.* Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). *IQNJ.* 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

benefiting sentient beings. TDVP is able to recognize the remarkably purposeful design in our world: Applying 'Lower Dimensional Feasibility, Absent Falsification' (LFAF) ^{5, 40, 73} we might even argue for contradictions in the scientific feasibility of 'simple evolution'—whether evolution at a physical level with the claimed jumps in development which has been problematic. In this context, 'gimmel' is important. This refers to a necessary massless, energyless third component. It is critically important because it is mathematically proven: Every subatomic particle that is stable is in union with gimmel and this extends further up the cosmological scale. Gimmel also is linked with the infinite which means this is not as speculative as ever before because the math and physics is feasible. Further, that gimmel might have preceded the formation of matter and energy in the Big Bang or equivalent 'origin event'. ¹⁰

In the same way, one could argue that beauty is "in the eye of the beholder", that beauty is completely neutral. But the whole design, the whole fabric, even within the mathematics, is more than a beauty: There's a meaningful component, and there is a component that also links up Biblically, even with the first three sentences of Genesis, with Kabbalah, with E=Mc² being extended with fabrics pertaining to consciousness which we can interpret in those three sentences.

<u>Acknowledgement of a Greater Reality</u>

This is told in all humility. In this paper, we present some remarkable findings. We refer to some of our work with sincere meekness. Below, you will read about colleagues who have studied our findings in detail, and regard them as more than groundbreaking, even paradigm-shattering. However, what has guided us? We don't for a moment think this important shift from the current paradigm of scientific materialism to the realization that reality is consciousness-based and spiritually driven are purely our own independent contributions.

We know that, for us, it is the result of accessing higher consciousness realities. For us, this paradigm shift has been a series of remarkable inspirations and sometimes epiphanies, with certainty about what is correct and with the logic and sequencing of each discovery providing further confirmation of what was discovered before. Many times Dr. Edward Close and Dr. Vernon Neppe have had the same independent realization at almost the same time, 2000 miles away, quite independently, and yet in a remarkably consistent manner. ⁶⁷

Could it be that the findings below might be considered remarkable—in the sense of following the laws of nature, but in accordance with reality higher than our usual physical 3 dimensions of space in one moment in time—the present? Are these telepathic insights from one mind? Are there inspirational elements here? *Is it purely us? Is it spiritual guidance? Is it extended consciousness? Is it G-d?* With great respect, each of us can choose their likely explanation.

It's our opinion that we've been guided and inspired. We've been influenced. Could this be the creative spiritual expression of science at work? We postulate that's so. However, with great respect, we're most familiar with our own past and present findings so we can discuss these more than other models. We dare to discuss our TDVP and related models in detail here because, to us, they reflect spirituality more than any other models. Irrespective of whom we were, of all the proposed TOE paradigms, TDVP is clearly the most logical one to discuss: For one it is the only TOE that scores a perfect TOE score based on objective comparisons. Moreover, as indicated, TDVP is one of the few to include higher dimensions, infinity and extended consciousness; and by the time, we include mathematics, empirical demonstrations, spirituality, it is the only TOE left standing. Whether it is correct, time will tell but there is far more empirical and mathematical support for it now than when we first wrote about it in 2011. Moreover, there are many, many areas that are new but have been shown to be correct. We have yet to encounter a hypothesis that we strongly proposed, and which is pertinent to the essential aspects of TDVP, that has proven incorrect.

Drs. Stewart and Klein, the two major scientists who've most studied TDVP, profoundly esteem this paradigm emphasizing (Dr. Klein has used the term "emphatically") that TDVP represents extraordinarily important ideas even when compared with a standard of groundbreaking contributions through the ages. Moreover, Klein and Stewart are not alone: many other scientists, in multiple disparate specialties, and even two theologians have esteemed TDVP: Later in Section 13: the epilogue, we will list the comments of Drs. Klein and Stewart in some detail, plus we will briefly add quotations about TDVP or aspects of it from a collective 21 more scientists.

By that Epilogue stage, reader can make up their own minds, and see if they correspond with these other scientists quoted. However, we list these scientists not to be immodest, but to allow objectivity in emphasizing that it is not only Drs. Neppe and Close who regard these ideas as relevant. Therefore, the choice of emphasizing this TDVP model as a key to unifying Science and Spirituality is further justified by outside referees. But of course, there will always be those pseudoskeptics who will argue that, whatever we find, it is irrelevant of not enough. We welcome an appropriately skeptical approach. That helps progress in science.

But to the *pseudoskeptics*, *who are not objective*, we offer a simple message: We recognize your limitations and understand, but please do not claim to be scientists, because you're not. You are perpetuating a limited belief system, masquerading in your fixed, ignorant, unalterable, incliminable religion that could be called 'incomplete science with unchangeable beliefs' or scientific bigotry or denierism.

*Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional

THE NINE NEPPE AND CLOSE DISCOVERIES THAT HAVE COMPLETELY CHANGED THE CURRENT CONCEPTION OF REALITY: SECTION 4

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

We apply the following statements in general terms to emphasize the key concepts. Some of these findings are described in more detail later. ^{e f}

These comments are scientific, and yet those outlined here could also be regarded as strongly linked with consciousness or spirituality. Nevertheless, frequently, these are derived purely from a scientific and mathematical perspective, with the discoverers not regarding this as linked with spirituality.

We emphasize here the first component of our findings that we regard as our epiphanies and collaborative awarenesses. But we have chosen those of our findings that colleagues regard as having the potential to change thinking in science relating to spirituality. These examples are illustrative and there are likely many others, not yet explored by Neppe and Close, that could have been used instead, for example, we might use TRUE ^g analysis to investigate why there is so-called junk DNA. Could this reflect 'consciousness' and/ or 'higher dimensions'? (translated as 'spirituality' or G-dliness). ^{95, 96} We summarize some key findings in Triadic Dimensional Vortical Paradigm) TDVP pertinent to spirituality. ^h We list these recognizing the great respect we have for other researchers, and with a profound awareness of our own limitations.

1. <u>Materialism is mathematically refuted at the atomic level:</u> The common teaching that the atom consists *only* of protons, neutrons, and electrons is *physically and mathematically impossible.* ^{i 97} This refutes the fundamental idea of atomic materialism. ^{12,98 9 81} We cannot have half an atom or half a particle

[•] The data here is based on hundreds of publications and the Neppe-Close book *Reality Begins with Consciousness:* A Paradigm Shift that Works (www. brainvoyage.com). It is often very complex and therefore we're stating the basics in the text, and clarify with footnotes and references.

^f Each of these Neppe-Close/ Close-Neppe discoveries radically interface Science with Spirituality, besides the comments about apparent. inspiration and collaborations with broader extended higher consciousness.

g TRUE analyses involve a recently empirically verified, objective technique for calculating gimmel, mass and energy.

^h TDVP = Triadic Dimensional (Distinction) Vortical Paradigm, the Neppe-Close metaparadigmatic 'theory of everything' originally proposed in 2011, and fundamentally unchanged, but greatly amplified in scope and extensions of the model since then.

¹ That third substance we have called 'gimmel'. Moreover, such quanta are not just points, but volumetric. These calculations *prove that materialism at the atomic level is refuted.* Specifically, the atom is volumetric and integral and so are the subatomic particles (electrons, protons, neutrons, and quarks) and as we know them, they are mathematically unstable applying all three different procedures available: 1 Volumetric analyses of the atom. 1. Mass and energy of the atom. 3. Mass-energy equivalence analyzing TRUE unit equivalents" (TRUE unit).

(e.g. electron): ^{8, 9, 11, 12, 14-17, 19, 70, 99-104} The same math logic demonstrates the need for a third agent ('gimmel') ^j to explain the stability of sub-atomic structures: ^{k, 12} protons, neutrons (with quarks) and electrons need something else for stability. ⁹⁸

- 2. We exist in a 9-dimensional rotating, finite, quantized, volumetric reality. 1 m 105108 109 23, 110-112 113-116 117-119 There are 9 finite, spinning, quantized dimensions (9D)
 embedded in a continuous infinite. We must exist specifically in a 9-dimensional
 finite rotating cosmos n. The 9-dimensional finite spinning model of reality has
 been empirically replicated on several occasions. This greatly enhances our
 perspective of the nature of reality.
- 3. <u>Gimmel is a third agent besides mass and energy:</u> The atom has not only mass and energy as 'contents'. For stability, a third form of content is necessary —a mass-less and energy-less content (called 'gimmel') that is in necessary <u>union</u> with mass and energy in all subatomic particles in consistent and specifically defined mathematically and empirically proven quantities for each particle. Without gimmel, our cosmos simply could not exist as it would be unstable and atoms would fly apart. Similarly, the extent of Consciousness is tethered to Space and Time. ¹²⁰ o Gimmel has versatile applications, and involves important concepts of 'gimmel' TRUE units. ^{8, 9, 11, 12, 14-17, 19, 70, 99-104p} It is empirically proven.
- 4. The infinite continuity plays a critical role in our existence, and in life, and order. The infinite is needed, because without it TDVP could not be a TOE. It

^j Gimmel is our 2015 necessary, required concept for a massless, energyless third aspect in nature that allows for volume and completion of chemicals. We apply various terms for gimmel such as a third *substance*, *vehicle*, *agent*, *process*, *and component*.

^k We proved mathematically that without gimmel, the atom could not be stable. Gimmel' must be added to *each* of the elementary particles (Protons:1 down and 2 up- quarks; Neutrons: 1 up- and 1 down-quark; and Electrons).

¹ In all these new discoveries, we list the year that we first described our finding: This may or may not correlate with the first publication in the area. The first-mentioned scientist (Neppe or Close) refers to the initial discoverer although in all instances our work has been collaborative. In this instance, it's Close and Neppe, mid to late 2013.

^m Dimensions, like all terms in this discussion, have been carefully and specifically operationalized: Technically, dimensions are non-congruent, non-parallel extensions: They are *measurable* in terms of units of *extent* (CoD) such as Space, Time and (dimensional) Consciousness. Operationally, in the Euclidean framework, for convenience, dimensions are defined as orthogonal to each other and characterized in degrees of freedom. Dimensions interact together forming different 'dimensional domains' with specific properties.

n 'Rotation' describes the 8 rotations between dimensions 1 to 9. In quantum physics, terms like 'half-spin' imply 180-degree rotations are used: So, 8 rotations. 'Spin' is an alternative to 'rotation' so if half-spin = 4 full '360-degree' rotations. In 3S-1t, it's illogical: 1.5 rotations. More correctly, the Neppe-Close view recognizes that there are always three rotations e.g. in quarks all orthogonal (90 degree in many dimensions) and parangular (dynamic orthogonality across dimensions) to each other. This means that even so-called 2/3 spin times 3 will produce an integral number of rotations from Dimensions 1 to 9.

^o the atomic structure with <u>just</u> protons, neutrons, and electrons (or quarks and electrons) alone is mathematically impossible (Neppe and Close, 2014).

P TRUE = Triadic rotational units of equivalence. our necessary, empirically proven mass-energy-gimmel concept. Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

could not be a TOE, because applying *Gödel's incompleteness theorems* ^q ¹²¹⁻¹²³, the finite alone would be insufficient: there would need to be something beyond the 'finite box'; that something is the infinite continuity. ^{122, 123} ^r Without the finite being embedded in the infinite, the solution would be 'incomplete' as the finite would still be contained in that same finite. To be 'complete', something must metaphorically be 'looking inward from outside the finite box'. Thus, to be a TOE, the quantized finite requires something not quantized outside, yet completely containing that finite that's inside the box. The infinite, which has different qualities—'continuous', not quantized, enveloping all the finite—fits.

- 5. <u>The laws of nature are unified:</u> Effectively, the same rules of nature apply for everything. Scientists can apply the same findings for quantum physics, cosmological reality s and our macroworld. ¹²⁴ The common feature is Gimmel and TRUE unit analyses, and the 9-dimensional quantized vortical t finite reality s, ^{14, 125-128} embedded in the infinite continuity. Our data demonstrate these concepts are not just abstract mathematical operators, but that they describe empirically relevant real phenomena. The existing laws of nature involve the same universal rules at all levels including quantum, macro- and cosmological domains. There's no 'quantum weirdness' or 'dark' cosmic paradoxes: Our findings reveal a 9-D finite reality embedded in infinity; the same rules extend to the spiritual realm.
- 6. <u>Scientific boundaries require extending beyond the proof of falsifiability: alone:</u> <u>Feasibility and LFAF allows science to be better applied.</u> Scientific feasibility is a legitimate and critically important method that applies beyond the usual but very limiting concept of falsifiability. VLFAF extends the whole basis of science,

^q Kurt Gödel (1931) showed that any finite system cannot demonstrate its own consistency: We need to go outside that system to fully recognize the full mathematical implications.

^r Our data shows the atom cannot be stable unless there is an additional third substance (gimmel). Atoms, mathematically, have to be very precise: They can only be whole (integral) with the correct combinations of very specifically derived gimmel scores being added. We created a unit score for the electrons, and recognized all other structures must be quantized integers and they should be calculated by volume ('Volumetric Equivalence' or VE) applying the new Close-Neppe "*Triadic Rotational Units of Equivalence*" (TRUE) units. *Unless we incorporate gimmel in the correct quantities into the atom, mathematically atoms would just fly away*—atoms need to be stable to exist permanently: They would be unstable without a union with gimmel. Basically, this means that we cannot have, for example, half an atom or a half electron. (Neppe and Close, 2015)

^s Dark matter and dark energy proportions to the cosmos correlate within 1 in 1250 with gimmel to TRUE. Ratio of dark matter with nucleons (protons and neutrons) to dark energy with electrons closely correlates. As 95.1% 'dark' substances cannot fit into our 4.9% physical universe (3S-1t), we postulate it fits into the 9-dimensional model. Gimmel and 9-dimensional quantized spinning finite reality eliminates most of the unsolved and illogical findings of quantum 'weirdness'.

¹ Vortical: Vortices are ubiquitous in nature. A vortex rotates and moves across volumes (3 dimensions).

^u Our data shows that the TRUE scores for quarks, electrons, neutrons and protons, are exactly the same as those in the Large Hadron Collider and the standard calculations show atomic mass units of e.g. Hydrogen to be the same as the TRUE derivations.

Vertical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

extending science to evolution including cosmology, meaningful evolution (with spiritual implications), consciousness research including psi and survival, most of the relevant facets of medicine, pharmacology and biology that are better interpreted in practice as 'feasible' even when they can be falsified w, extra dimensions that change our fabric of reality, and infinity that has enormous spiritual implications. ^{5, 40, 41, 73} ^{22, 40, 129, 130}. x

7. Vortical movements (Rotation, 'spin') are through 9 dimensions:

All of the Elements of the Periodic Table are made up of stable vortical distinctions that are known as fermions—"particles" with an intrinsic angular spin of ½; or they are made up of combinations of fermions.

We can analyze the fermions that make up the Hydrogen 1 and Hydrogen 2 atoms and Helium atoms and all other elements. We can examine their parameters of spin, charge and mass based on experimental data. The top- and bottom-quarks and the charm- and strange-quarks are ephemeral unstable particles, so are not part of the calculations, and nor are neutrinos or any "anti-particles". ^{8, 14} (Close and Neppe, 2017). We've further recently mathematically and empirically demonstrated this result is correct for electrons, protons, and neutrons (where the derivation is more complex) and for the Hydrogen atom itself. ^{18, 85-94, 29}

- 8. <u>All of empirical reality is based on quantized volumetric measures.</u> Applying the 'Close Conveyance Equation', this means that there are only rare natural suitable Diophantine solutions of $a^3 + b^3 + c^3 = d^3$ in elements and compounds. ^{8, 14} In every instance, 'c' refers to the quantity of gimmel that needs to be in union with nucleons (protons and neutrons) and electrons.
- 9. **Stability of atoms:** Our universe requires every particle with mass and/or energy in the universe to be in union with a fixed amount of stabilizing third component (of gimmel TRUE units). ^y Without gimmel, rapidly spinning particles would be unstable and ephemeral; they would simply fly apart. ^{131-133 z}

w The limitations of feasibility are ignored in Medicine.: We want to get better. An antibiotic that works at 51% level may statistically be proven by 'falsification' (in double-blind studies) to be better than placebo at 48%. But we want scientifically feasible treatments (e.g. that antibiotic, given the correct bacteria, should help us almost always (e.g. in 95% of cases).

^x LFAF: The commonly used description for Neppe-Close Lower Dimensional Feasibility, Absent Falsification (Neppe and Close, 2011), a Philosophy of Science technique to extend the current idea that science needs to be falsified. Scientists are raised to be hypocritical and inconsistent: Cosmology, evolution and quantum mechanics with its 'weirdness' are regarded by the establishment as sciences even though they're based on feasibility and often not falsifiable; yet prejudice reins: parapsychology, which applies the most detailed research in all of the sciences is labeled a 'pseudoscience;' and consciousness research and dimensionality that apply feasibility and falsifiability, are generally regarded as 'pseudosciences'. Somewhere in between are the Forensic Sciences, Social Sciences and Medicine because they are often not falsifiable, but feasibility is the key to their scientific interpretations.

^y Demonstrated with quarks, protons, neutrons, electrons, atoms, photons.

^z Ephemeral particles may not be in union with the required gimmel.

GROUNDBREAKING AND PROVEN DISCOVERIES: SECTION 5

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

We describe here seven discoveries. They are all groundbreaking and illustrated by TDVP's principles ^{4, 7, 39, 134}. However, despite being *empirically feasible and not falsified*, the level of 'proof' is based on the feasibility of the jigsaw puzzle pieces of data fitting. This allows us to extend science by applying the LFAF illustrative scientific proofs, despite some not being able to be Popperian 'falsified' ^{2, 3, 24, 135}. So 'proven' is applied in a different sense here—the LFAF way. ^{5, 40, 41, 73 22, 40, 129, 130}

1. The finite involves quantized volumes:

Everything—Space, Time, and Consciousness (STC) empirically contains volume—it is '<u>volumetric'</u> (3-dimensional so 3-D). Our empirical reality is not a point (0-dimensions), on is it linear (1-D) or planar (2-D). Volumes are always fundamental.

2. The infinite is without a beginning or end in all of STC:

- The infinite extends forever. Because of time happening eternally in continuity, all time that we experience in finite 'quantized' bits (like little pixels one at a time) can occur simultaneously.
- The infinite space, too, is never-ending, extending without end.
- And the infinite is a repository of conscious *information* containing everything in all time and all space. ¹³⁶⁻¹³⁸ (Neppe and Close, 2011)

3. The continuous infinite is ordered (it's 'ordropic'):

Whereas our finite existence is *entropic*—it tends toward disorder ^{7, 134, 139}, the continuous infinite, that contains the finite, tends of complete *order*. We call this property 'ordropic' (from 'order' and 'tropy').

The presence of gimmel in the infinite demands ordropy because it is a different substance, possibly an agent of consciousness that based on calculations cannot be destroyed, it maintains a balance between mass, energy and 'gimmel'.

Because gimmel is demonstrated in the quantized finite and the infinite envelops the finite, ordropy occurs in the finite, as well. Effectively, ordropy is the opposite of the 'entropy' that we experience in the finite, which is based on Newton's second law of thermodynamics.^{aa} In contrast, ordropy is linked with *existence*.

^{aa} Newton did not describe entropy itself, though. That is attributed to Sadi Carnot in 1824 when he described an upper limit in a heat engine to the efficiency of conversion of heat to work.

4. Life continues forever.

Everything biological is immortal. ^{103, 139-141}There is an existence before our physical life and a life after physical death. That existence includes our physical *life* which reflects just one phase of ongoing infinite *existence* that goes on *at all times*: This means *everything including ourselves is necessarily immortal*: Though there's physical death, that does not mean an end to real existence which in the infinite goes on forever. But what happens in the finite?

After physical death, instead of our experiencing the physical 3S-1t, a different dimensional STC footprint might exist such as portions of domains 5 to 9. The continuous infinite envelops all of the finite space, time and consciousness extent, and a mass-energy-consciousness content. (Neppe and Close, 2011) bb

Speculatively, gimmel might originate in the infinite. If so, this might reflect pure consciousness at that level, yet hierarchically that still would contain mass and energy entirely embedded in the gimmel infinite consciousness. (Neppe and Close, 2014) Gimmel is also in union with photons in the infinite continuity: We've hypothesized photons are in union with infinite gimmel GTUs. ^{cc} However, in the discrete (quantized) finite, the photonic state is different: photons must be in union with the *same amount* of GTUs as electrons, because of electron involvement in the photoelectric effect ¹⁴² (Close and Neppe, 2016).

5. TDVP is a theory of everything that works:

Searching for a Theory of Everything (TOE) has been a task that many have attempted. However, only TDVP reaches the heights of being a legitimate TOE. This is demonstrated when carefully performed metric comparisons of the 24 major different proposed TOEs are applied. ⁵

The Neppe-Close TOE of TDVP scores a perfect 39/39 and no others besides the original Neppe Vortex N-dimensionalism at 27/39 and Close Transcendental Physics at 23/39 even score 20/39 or above. Even the conventional Standard Model of Physics (SMP) scores only 13/39. This shows the SMP might be insufficient, though very useful in our physical reality. A recent analysis did not extend to the now 26

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bb We dislike the term 'Theory of Everything' because of its ambiguous interpretations, but currently this is the term that is used for a complete explanatory model of reality conforming to the laws of nature. TOEs should seamlessly reconcile with all the major theoretical models and authoritative sources of *all* the sciences and mathematics. However, they should *not be construed as reflecting omniscience*, instead implying application of principles. TOEs are sometimes regarded as primarily philosophical, yet the original, limited meaning was in Physics. We believe that the TOE term as used in popular literature is a misnomer. Not only does a real TOE have to explain physical reality, it also has to explain consciousness, dimensions and infinity. A TOE needs to be able to explain mathematically, empirically and feasibly without contradiction.

^{cc} GTUs refer to Gimmel TRUE Units. This describes the number of gimmel units in TRUE analyses in different particles. *Neppe, VM; Close ER*. **Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP)**. *IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619* © *Vernon M Neppe and ECAO*.

other models (including Jainism —not yet rated, but likely in the high teens out of 39). However, because the other attempts at TOE models score below 50% (at most at 19/39), the only relevant TOE to analyze was the Triadic Dimensional Vortical Paradigm: TDVP still scored perfectly at 62/62. dd (Recently, informally, TDVP was scored at 68/68.)

We maintain that consciousness has to be included in the equations to even begin to approximate a real TOE. TDVP includes all of this. Not only does it recognize consciousness as a key, and differentiates different kinds of consciousness paradigms 4, 39, 143-148

But TDVP also included infinity in it, because a TOE cannot be solved purely with the finite reality when applying the finite reality ^{122, 123} as it would be incomplete. ¹⁴⁹⁻¹⁵⁴ Neppe and Close developed the term 'metaparadigm' instead. This involves the broadest paradigm impacting all sciences, mathematics and philosophy without contradiction. To achieve the level of a TOE or metaparadigm, the model, like TDVP does, must be groundbreaking with new discoveries and applications.

6. Mathematics closely reflects the nature of reality:

Mathematics is real: It closely reflects the nature of reality. Math is more than just for calculations or operators. Mathematics is empirically meaningful. Mathematics appears to be part of nature, not just a method of calculations and operations. This hypothesis has support and is justified by our TDVP findings. Math is not just for calculating, but has a vibrant basis for reality. Our *analyses should be based on 3-dimensional cubic structures, not linearly*. Our findings have not yet been contradicted and are feasible. We can use this as tool for further hypotheses. It's our strong impression that mathematics involves empirical knowledge; it is not just a means of calculation. ^{8, 9, 13, 15-17, 70-72, 155} (Close and Neppe, 2011).

7. Translation from theory to empiricism

The atomic mass-energy-volumetric equivalents (MEV) in TRUE unit measures of protons, and electrons, directly correlate with the Large Hadron Collider! ⁸ *This means that TRUE units are real empirically not just a theoretical construct.* We can demonstrate that the electrons, protons and neutrons correlate exactly after normalization with the LHC data. The neutron, particularly, is an unstable particle (beta decay is about 10-15 minutes) ^{156, 157}, and converts mainly to protons ^{156, 157}, hence the same LHC calculations of these figures, after normalizations, are 1836 for the proton and when corrected 1839 for the neutron applying TRUE units! ^{ee}

 $^{^{}dd}$ Given that Kabbalah scored 19/39 with some unscored uncertainties; and Vedic thinking 13/39; it is likely that Jainism scores between 13 and 19, with ≤19/39 the most likely. But we are probably underscoring these philosophies. ce The neutron calculation is particularly complex because of its short half-life in the free form, yet it appears stable when combined with protons in the elements.

ADDITIONAL PERTINENT SPIRITUALITY AND SCIENCE COMMENTS BASED ON EMPIRICAL VERIFIED REAL-LIFE PROOFS: SECTION 6

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

- 1. *The 'life elements' have the commonality of the most gimmel:* TRUE analysis of the elements of the Periodic Table show that Carbon, Hydrogen, Oxygen, Sulfur and Nitrogen (spelling 'CHOSeN'), the most abundant life-supporting elements, contain high-levels of gimmel. Other elements, like calcium and magnesium also contain high-levels of gimmel. ^{ff 8, 9, 13, 99, 155, 158} Remarkably, applying TRUE unit analyses ^{8, 13-17, 99, 155, 158}, every 'life element' (Carbon, Hydrogen, Oxygen, Sulfur, Nitrogen, Calcium, Magnesium) is symmetrical and stable, and is quantized and volumetric fitting into an atomic mathematical calculation relating to TRUE multiples of 108³. ^{3, 8, 9} It is probably not a coincidence that these CHOSeN elements are also components the organic compounds used as incenses in spiritual practices in the temples of the major religions of the world. ¹⁵⁹
- 2. *Impact and influence imply theism:* Spiritually, this could point to theism (a creator that can influence and act) not deism. Fundamental to the mathematics of TRUE analysis is the Calculus of Dimensional Distinctions. (Close and Neppe). A key concept in the analysis is impact *and* influence. Consciousness involves impact, influence and intent: It has a directionality, an awareness, a meaning, and a responsiveness. And it's linked up with brain function at the neurological level.

 82-84 Impact or influence allows *bidirectional* ge impacts such as thought and prayer 160-162 allowing for meaning: 82,83 Impact and influence may imply a deeper involvement of consciousness beyond gimmel. Gimmel is a necessary but not sufficient vehicle for Consciousness. Experimentally, even random number generators can be influenced at the 1 in a billion level! 163,164,7 In similar vein, there are significant positive impacts on biological cultures. 165 166-168 165, 169 The influence of prayers 170,171 160,161,172-192 may reflect the involvement of a higher form of consciousness through the agency of gimmel. Impact may relate to events in the world, as well, such as earthquakes.

ff The CHOSeN elements are the same as those used in incenses in the temple. They contain the most gimmel: Could there be a link with the need to enter and access higher mystical dimensions?

gg 'Bidirectional' in this context refers to if a person prays to a deity, the deity will be able to respond demonstrably. This fundamentally requires answers to prayers. It has been measured in controlled studies.

- 3. <u>Nature's pattern can be found everywhere:</u> Our TDVP findings are empirically based and reflect these patterns. The normalized volumetric mass energies of protons, neutrons and electrons are not just theoretically but empirically relevant as the Mass-Energy-Equivalents in TRUE units are identical with the quantized 'normalized' Large Hadron Collider results ^{5, 40, 41, 73} ¹⁹³- these are *real phenomena*, they are not just theoretical constructs. The difference is enormously relevant, because it demonstrates that not only are the TRUE mathematically defined quantum units, but that they are real and empirically verifiable. The 'TRUE' mass calculations for atoms and sub-atomic particles including quarks, protons and neutrons, are exactly equivalent to the empirically determined atomic mass correlates in AMUs. ¹⁹⁴⁻¹⁹⁶.
- 4. <u>The 'God Matrix'? Gimmel is part of all atoms in union with mass and energy:</u> This third form of the 'substance' of reality is necessary for symmetric stability.

 hhGimmel is linked with electrons in abundance—105 gimmel TRUE units to the electron, and with protons and neutrons to a much smaller degree. The TRUE values determined for the elementary particles are not arbitrary or contrived; they are the simplest, and in some cases, the only possible mathematical solution in quantum units. This finding is huge. (Close and Neppe, 2016) 8, 9, 11, 14-17, 19, 70, 99-104. The discovery of gimmel led to us using the term God Matrix, 9, 70-72 a more logical term than the so-called God Particle—the Higgs Boson, an ephemeral particle, not even fully proven or understood, and with no ostensible mystical elements 197, 198 that might justify the term.
- 5. <u>A necessary pattern in nature: TRUE units.</u> The establishment of Triadic Rotational Units of Equivalence is an enormously important concept because by normalizing the data for the Diophantine triplet equations that describe the combination of elementary particles, one is able to explain the stability of atoms. This cannot be achieved by pure physical materialism of matter and energy alone, or specifically just protons, neutrons and electrons (together we've called these 'neptrons' (*8,9). TRUE units reset thinking in the area of Quantum Physics. TRUE units, too, involve very detailed mathematical calculations based on triadic Diophantine equations, Calculus of Dimensional Distinctions (CoDD) and Dimensional Extrapolation. Again, the mathematics produces not speculations here, but proofs. (*8,14-16) TRUE unit calculations repeatedly work theoretically and

hh The term substance here for describing gimmel is used in the absence of anything better. "Substance" has philosophical and physics implications, referring to "material, matter, stuff". Gimmel is none of these. We had contemplated instead referring to gimmel as a "process", or as a "property". Mathematically it is a kind of quantum unit involving "1 gimmel TRUE unit"; and in another sense, it is referred to as Consciousness but we think it is the Vehicle of Consciousness; in physics we know every stable atomic particle is in union with gimmel. So, we use 'substance' here by exclusion of other terms.

- are verified with empirical data. We know therefore that they are soundly based theoretically, mathematically and experimentally. 111, 112, 114, 199, 200
- 6. <u>Hydrogen and its ubiquity:</u> Hydrogen-1 compensates for its absent neutron by containing extra third agent to maintain rotational stability. This makes it the element with a union of by far the most 'gimmel', and likely explains H1's ubiquity in the universe. ¹⁰² Based on the analyses, and its properties, this is not a chance finding. ^{18, 85-94; 102, 201-205}
- 7. An elegant and remarkable mathematical logic is the central feature of reality: Logical patterns in the primary structure of reality are exposed by the CoDD TRUE analysis of TDVP, rather than remaining hidden behind multiple arbitrary, non-commensurate mathematical procedures as they have been in past and current scientific paradigms. 84, 111-113, 199
- 8. <u>Mathematical order to the elements: The electron shells and the Periodic Table:</u> The role of gimmel: The positioning of electron shells has great relevance to valence and the stable combination of elementary particles. When applying TRUE units, a secondary consequence is re-establishing the rules governing the laws of the Periodic Table of the Elements—e.g., the noble gases, Helium (He) and Neon (Ne), based on their electron shells 1 and 2, demonstrably have the same proportion of gimmel as the life-elements. ^{8,9}. However, they are inert with equivalent valences of 0 and thus are non-reactive: Valence is a criterion with the life-elements.
- 9. <u>Biological Energy Packets: DNA and biology:</u> From TRUE analysis, Phosphorus may be important to the existence of consciousness-supporting life, as critical energy packets in organic molecules. life and even in DNA in the form of Phosphate (PO₄). P ¹⁰³ But because of the properties of phosphorus, it is unlikely that DNA and RNA would show a pattern like the life-elements and being a product of 108³. DNA provides a template for all biological compounds and these are variable, and more than just pure information including energy and the resources for life. So, we would not expect it to have the properties of life-elements.

CONSCIOUSNESS AND SPIRITUALITY: SECTION 7

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

Consciousness is a term that thousands have tried to conceptualize and define, and yet few, if any, have adequately achieved this. Neppe and Close recognized this problem and in a classic paper have classified it using four 'EPIC' different prongs that have to be used in every instance ^{147, 206}.

EPIC Consciousness:

These four EPIC prongs are 'Essential', 'Paradigmatic', 'Informational', 'Cybernetic'. 'Essence' used to be termed 'Existential'. 20

E in EPIC: Essence Consciousness 147

In effect, this 'Essence Consciousness' can be conceptualized in three ways, and all three can be applied to spirituality, with the first possibly the essence of spiritual consciousness.

We have changed the name of the E in EPIC from our previous 'Existential Consciousness' to another E, 'Essence Consciousness'. 'Essence Consciousness' has nothing to do with 'Existentialism', but plenty to do with *existence* and the *essence of our being*. ^{144-147, 208}

'Existential Consciousness' ¹⁴⁷ is a misnomer that could easily be incorrectly understood to be interpreted as 'Existentialism' ²⁰⁷—'the philosophical approach of the individual person emphasizing being a free and responsible agent who determines their own development through acts of the will'. Existentialism might imply disparaging science and denying the existence of objective values. Indeed, 'existential' in the context we were using it as, is almost the opposite of our application of 'essence' in the EPIC acronym: We refer to 'essence' in the context of a different kind of 'existence', one that involves our covert dimensions enveloped in the infinite plus includes our overt 3S-1t physical 'experience'. We want to communicate our unified essence.

By *Essence Consciousness* we apply the distinction of quintessence and fundamental qualities of the whole. In TDVP, the Essence would be our 9-dimensional quantized finite plus transfinite existence embedded in the infinite continuity that envelops all this. Essence Consciousness incorporates far more than what we directly *experience in our limited physical 3S-1t*, which constitutes only a small proportion of the whole. Importantly, there is a special application of EPIC consciousness to spirituality. A

major mystical or prayer component involves 'influence' occurring for example during prayer or visualization, from the supplicant or worshipper, to a deity or equivalent. It is bidirectional and 'impact' would imply feedback from that Divinity: The phase "my prayers were answered" would be a classic illustration.

This links with this new term suggested by Neppe namely Essence Distinctions ^{7, 147} in Close's Calculus of Distinctions ⁸²⁻⁸⁴. This Essence Distinctions model has been used in the Neppe-Close TDVP model ^{7, 147}. This is a key part of the EPIC—the E for Essence Consciousness. It incorporates Influence, Content and Extent (or 'ICE' and these are three remarkably important concepts reflecting the whole essence.

• Influence: This is a key component of the EPIC consciousness, as it may be the most decisive in defining Consciousness. This is because influence and impact — the motor action equivalent of influence— implies interaction with intervention. So this essence distinction may be the most important in conceptualizing the highest elevations of the mystical consciousness phenomenon. Impact, intent, and influence are the keys to communication—maybe metaphorically from the first person 'I' to the unified essence! Influence and impact are reciprocal phenomena: They begin with an active intention to influence. This is intended to produce a change—an impact.

The importance here from a spiritual point of view in TDVP is one of 'essence': a bidirectional *prayer and the capacity to induce change*. This describes a higher-level intention of the ability to communicate meaningfully: all consciousness appears to have a communication level. This impact of consciousness cannot be on its own: It requires an interaction, an influence, a relationship. And that *bidirectional invocation followed by a higher-level response in theology implies theism—G-d is intervening*. This theism is contrasted with deism, where there is still Divinity, but a 'clockmaker' who did his designing—creating—and doesn't thereafter intercede with Mankind. ²⁰⁹

- **Content:** Consciousness can be conceptualized as a *container or receptacle* that has content—it is what the experience is all about. That can include the higher-level experiences, for example, prayer, G-d, mysticism, insights, knowing, wisdom, intuitions. It also includes the content of dreams ³⁴, of thinking, and how we experience altered states of consciousness, for example. ³⁵
- Extent: Consciousness also has *extent*—it is the measure of that experience across dimensions, and the *consciousness dimensions* are generally latent and covert because they are the higher dimensions above 3S-1t, which does not contain very much consciousness: this is a hidden mystical aspect.

The *extent* of consciousness has another mystical application: It can be small, minimal, or very large—in other words, this extent can be measured *ordinally*. At the infinite level, this mystically implies a repository of knowledge, insight, wisdom, understanding and knowing that never ends. Clarifying too, much of Essence Consciousness is really Gimmel reflecting extent (measured in Gimmel TRUE units—GTUs) equivalent to Consciousness Extent (C_e) or Gimmel content likely like Consciousness Content (C_c) or even Gimmel impact like Consciousness Impact (C_i).

Moreover, these extent ordinal measurements can be applied mystically at higher levels of space-time too. This is because time and space are embedded within that consciousness, using the TDVP model, where space, time and consciousness are tethered—the space is contained within the time, and the time is contained within the consciousness—space and time, as measured beyond the physical domains of 3S-1t, are also ordinal as opposed to interval: Whereas you could use integers to measure differences in height and length —even space extends far beyond our physical reality and so is measurable only in terms of time and consciousness. This implies multidimensional time, extending forever at the mystical infinite level. It also entail extending without end in space at that infinite level. Also, all knowledge, information, understanding and wisdom lead theologically to concepts such as omniscience.

In the infinite continuity, Space, Time and Consciousness all become spiritually without end: Whatever has and will occur is eternal, all places are extended forever, and information of consciousness is unending repository which specifically targets meaning into our 3S-1t brain, just as time is comprehended only in Past, Present and Future and experienced only as 1t (the present). And Space though length, breadth and height in 3S-1t, can be conceptualized far beyond the measurable physical extent intervals into higher ordinal dimensions. That is similarly so for Time and C_e.

P in EPIC: Paradigmatic Consciousness

We chose the term 'paradigmatic' consciousness ¹⁴⁷ because two of the kinds, Quantal and Extended (Higher) consciousness reflected special new models in our worldview. Given the degree of impact of a metaparadigm such as TDVP, the term may reflect some disappointment. But still the separate concepts of Quantal in the finite and transfinite, and Extended in the infinite, represent something very new. Our physical brain consciousness represents the easiest kind of the P in EPIC: It is not a paradigm to speak of consciousness at the neurological level. This is what is reflected in the brain though we write about 3S-1t with space and time and ignore the consciousness.

<u>Psychological:</u> The paradigmatic levels also have <u>psychological consciousness</u>. That Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

is a little different, because *consciousness* involves many possible psychological aspects, which still sometimes involve behavioral expression, but can involve only thinking. But this is phenomenologically quite different from the other Paradigms of Consciousness. One could technically write that there's a little bit of C for consciousness there and so 3S-1t-1C may be more appropriate to reflect our consciousness in our brain—and this usually describes our cognitive (thinking), affective (emotional) and volitional (motivational and motoric) aspects. Many would describe this as the classical psychological mental states and so we have psychological states which represent the most conventional of our consciousnesses. but includes complexity such as personality structure, and intelligence besides mental states. It has a link with the spiritual because it includes attitudes and beliefs. We can certainly talk of a *collective consciousness* and an individual one, and different levels of collective consciousness, and we can talk in terms of depth psychology too. But this is not really consciousness as we see it. Such depth psychology ideas as Id, Ego, Superego, are really analytic phenomena of thought behaviors expressed within the triad of affect/emotion, cognition/thinking, and volition or motivational or behavioral components. We're not even sure if this could be described as a kind of consciousness.

<u>Neurological:</u> The closest one gets to real brain function is where one is talking about levels of consciousness in neurology, ranging from coma through to full consciousness.

That level itself is a little different; however, that level still involves communication, because one is looking at awareness and responsiveness and trying to measure that using scales—for example, the Glasgow Coma Scale. ²¹⁰ Even here one is therefore still trying to measure degrees of communication: Can one impact the patient? Can one evoke a response? Is there some kind of communication? And this is a fundamental. But importantly, the neurological consciousness represents the nervous system and particularly the brain.

But the brain, and often the temporal lobe of the brain, specifically represents the final common pathway for any external / mystical consciousness. ²¹¹⁻²²⁰ Neppe has described the temporal lobe as the mystical 'window into the mind'. ²²¹ Add to this, the dozen or so Altered States of Consciousness ²²² that Neppe characterized in the paradigmatic fabric, the mundane Neurological Consciousness can reflect a new way of perceiving different realities.

But the two other kinds of paradigmatic consciousness are *external* and certainly relevant mystically and spiritually: We've alluded to Quantal and to Extended (Higher or Infinite) Consciousness.

<u>Quantized:</u> Possibly the most controversial paradigmatic consciousness is <u>quantized consciousness</u>. We can debate its existence. Could a particle or subatomic particle have some form of consciousness? To have a legitimate definition of consciousness we need to apply it all levels. The quantal level is the minimum finite level. If we look at the measures like awareness and responsiveness, we don't know if either are linked—except that we know the quantized level can definitely be impacted. We know this with experiments with random number generators (RNG) ^{163, 223-225}, where one tries to impact or influence the random number generators. However, with large numbers of tests this can generate results that are marginal proportionally, just very slight so it's a small effect, but statistically are beyond the 1 in a billion level, but an apparently definite effect. ^{38, 143, 148, 164, 226-232}

It may be that biological contact or consciousness contact is required with the intentional random number generators showing these frequentist statistics of 1 in a billion against chance—also called 6 sigma statistics. Therefore, *there is some kind of quantal consciousness* where there can at least be an impact that has happened; although we cannot show that the electrons or quarks—these elementary particles—are responding or have any kind of their own behaviors.

Nevertheless, to have a legitimate definition of consciousness we need to apply it all levels. What of this quantal level? In some kind of way, these 'essence' influences and impacts must be able to be reduced to a minimum requirement for Consciousness applying that impact-influence-intent level standard of some kind of *awareness and/or responsiveness*. That would imply a minimum requirement for 'Consciousness', and perhaps we can best refer to *deliberate intentional perturbation* of the system, as opposed to an object or event being manipulated randomly ^{163, 223, 233-240, 148, 164, 226, 241}. This new quantal concept might be analogous to intentional though minimal impacts or deviations at the atomic particle or atomic vortices levels. That means impact is required, requiring some kind of measured *response*. But we cannot measure awareness, so that would remain an unknown—whether subatomic particles individually or in combination (e.g. eventually becoming part of the macrophysical reality, like an ostensibly solid, simple object like a grain of sand or a rock) can controversially be *aware* or at least supply information as suggested by psychometric studies in psi. ²⁴²

Speculatively, this could potentially involve a collective unit of billions of subatomic particles all put together. The result could possibly be higher if we could measure awareness instead of, as with the 'random number generator' (RNG) data ^{163, 225, 234}, responsiveness. This measure is intent and the meaning might come from humans with purpose. But we have no evidence that these particles have purposes, although they can be impacted. This may be an example of the whole being greater than the sum of its parts: the billions of particles.

At the most basic atomic level this may be pertinent: Non-stochastic (in lay-terms, non-randomness) implies that any individual or collective subatomic particles might not even be only awareness and response: There may be no response despite impact and influence because there may be a required threshold. Ultimately, impact, influence and intent reciprocally are fundamentals of consciousness, producing a meaning and an intentionality; and it may not be individualized, it can involve individual units, one or more levels of a collective systems aspect. 4, 7, 134 We have ants in colonies and the ants are behaving as a unit. This idea of the individual unit—with the quarks and the electrons put together making up atoms and the atoms put together making molecules and the molecules building up a whole system—might well imply that some kind of impact or influence is going on there. ²⁴³

At the biological level, we get to DNA and RNA and the messages there; and in the DNA and RNA we have so-called 'junk' DNA. 244-246 However, astonishingly perhaps, a PubMed literature review did not yield a single paper that even linked up junk DNA with consciousness. However, there are others, particularly the Gariaev work out of Russia, which pseudoskeptics have heavily criticized. ²⁴⁷⁻²⁴⁹ Could it be that that 'junk DNA' is in fact some kind of spiritual component, some kind of component of so-called consciousness? Could it be, so to say, our unseen Godly sparks within us? 51 Could we speculate that what has been regarded as apparently non-functioning, useless, 'junk' patterns of extra DNA segments, have a role in the expression of some kind of meaning or consciousness? Why is it that apparently there is more 'junk DNA' in human species than any other and that the hierarchy of development in the animal kingdom corresponds? ²⁵⁰ Why is it that 97% of DNA is ostensibly 'junk DNA' to the extent there is only slightly more DNA genes (23,000) than that in flatworms but slightly less than in rice? Does this make sense? At least, we could call it, as some have, 'unknown DNA'. Only if it were consciousness and the vehicle may be Gimmel. Gariaev argued that DNA 'words' produce and help in the recognition of semantically meaningful phrases. These follow uniform grammar and usage rules virtually identical to those of human language. ²⁴⁹ The purpose? To Einstein, God was "clever but not malicious" and "God does not play dice." 51

With great respect to establishment science, sometimes, we need to admit that there is more in our cosmos than we recognize. We need to recognize that the absence of knowledge about genetics does not mean it is 'junk'. We need to use known knowledge of what is feasible applying our jigsaw pieces: The advent of gimmel, with a proven mathematical component that already is empirically proven based on correlations with the Large Hadron Collider, and of that same 'substance' gimmel—also being strongly correlated with 95.1% of reality, namely Dark Matter and Dark Energy 9, 11, 12, 18, 204, 8, 14, and the awareness of a 9-dimensional quantized finite model embedded in an infinite continuity 124 8, 14, 125-128, suggests that maybe Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

consciousness or its agent (which may or may not be identical to 'consciousness') is an appropriate model to at least consider for 'junk DNA' which might be far more than just junk!

And what role would this have with Quantal consciousness? And is this linked with a consciousness in the build up from particles to atoms to molecules to tissues to organs to systems in the living being?

The important point here is that impact and influence can play a role in subatomic particles, but the subatomic particles may or may not be able to be conceptualized as having a consciousness that is independent. They may, in fact, be dependent on biological or behavioral interventions, and may also reflect necessary combinations of these. Is that just a variation of all the forms of consciousness being interdependent on each other or is it possibly the same fundamental consciousness?

Infinite Consciousness: The important paradigmatic consciousness might well be the *external*, or *higher*, *or infinite consciousness:* Some would hypothesize this comes from a divinity. This, like quantal consciousness, would be perceived as external to the body (although technically both impact the body). However, quantized implies a finite, discrete quantal source; higher consciousness is usually extra-cerebral but would reflect the infinite continuity. It is not pixilated or discrete but reflects an unending repository of knowing, wisdom, understanding, information and knowledge.

We propose that this infinite wisdom impacts everything and can be utilized. This differentiates Deism, where there is no impact or influence: G-d is purely the 'Watchmaker' or 'Clockmaker' and has had no further impact on this world. ²⁰⁹ Maybe he produced such perfection that no interventions are needed. But essentially, the watchmaker deism does not intervene: Period. That would be a perfect 'ordropy': A multidimensional order but a static one with no improvements or changes or challenges or logically, no free-will. It seems illogical, and in fact, given our model of TDVP, we know this would be impossible, because there is strong support for the *law* of conservation of TRUE units including gimmel. 18 This law shows that nothing is lost. This produces an ongoing situation of ordropy—of a state of order as opposed to disorder; a dynamic ongoing multi-dimensional order across the infinite. Ordropy is more than 'neg-entropy' (negative entropy). So nothing is lost, and therefore, the idea of Deism would be very much less than the concept of Theism, which is far more likely. The 'Watchmaker' could have theoretically "set the clock" 209 so it runs indefinitely on ordropy but then the major question would be: What is the purpose? What is our purpose? We do not understand the purpose and meaning for our existence with this deistic view.

The 4 consciousness paradigms are now revisited: We have our four kinds of paradigmatic consciousness—psychological, neurological, both inside the living individual; but technically one could argue that psychological consciousness could live outside as well, maybe with survival ²⁵¹ ²⁵² ¹³⁹, ¹⁴¹, ²²⁶, ²⁵³-²⁶⁰, which we've demonstrated is very likely, using TDVP ⁷, ¹³⁴. Then quantal consciousness, which requires possibly a push from the outside finite reality. Finally, external, higher, infinite consciousness, which might have a correlation with a deity, and which includes prayer and where we have the impact and the influence. Each of these four types reflect new paradigms conceptually of what they are, what they do, where they are and why they are.

I in EPIC: Information and meaning

We conceptualize meaning as something that is targeted, that conceptually is focused in the direction, for example, of the receipt by the brain. This is where the psychological consciousness might come in, as well, because this gets modulated through our own hierarchical systems, our beliefs, our whole culture, our society, our cognition, affect, and volitional experiences and our potentials there. But *information* could be conceptualized as that whole full repository—a never-ending *repository of knowledge, wisdom, understanding.* Kabbalistically, we have the ideas of *Chochmah*, which is a wisdom but an intuitive wisdom; *Binah*, which is an understanding; and *Da'at*, which is a knowing—a knowledge. All of these would be part of that infinite repository. This clearly is critically relevant for either the watchmaker or the ongoing dynamic active ordropy of a divinity that does, acts, responds and understands.

C in EPIC: The Cybernetic EPIC

We could conceptualize consciousness cybernetically in terms of afferent, central and efferent. This is on the surface less relevant other than applying a computer model. But it still may be mystical and spiritual because information and meaning can impact our physical body or other dimensional domains and be received (afferent), and in return we can give or pray (efferent). The brain centrally modulates our physical being (central).

Consciousness is individual, as well as collective at every systems level. Consciousness therefore has distinctions that could be described ultimately at 31 levels! ⁷ And this cybernetic model involves multiple systems levels or what we call 'individual-units'. ⁷ 147

A controversial re-evaluation of the fundamental consciousness

So, what makes the fundamental aspect of consciousness? This question has been asked by hundreds of scientists in different situations. We postulate that an answer may come in the context of what influence and being influenced means. Essentially, Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

one example would be prayer with the potential for response.

We argue that the essence of consciousness involves a behavior that is not stochastic—it is not randomly determined. Sometimes, events happen and we statistically analyze them, though we still cannot predict them statistical precisely. Then when we deliberately consciously meaningfully and intentionally subject them to deliberate manipulations (mind over matter, effectively), then we find that non-random events happen. At the atomic level that demonstrates that 'mind-over-matter' in human interventions work, but we may not even be able to predict in which way it is happening. ^{163,164,7}

The fundamental 'Axiom of Origin'

Importantly, consciousness is not derivative of space and time, or mass and energy; and space and time or mass and energy are not derivative of consciousness. Consciousness has its own independent identity. Neppe and Close have cogently argued that Consciousness is a substrate like Space and Time and has dimensional extent and is measurable. ^{7, 120, 134}This is the Neppe-Close Axiom of Origin. ⁷ We have also recognized that Consciousness has a second description as content just like mass and energy. ^{18, 144-147}

Perspective:

The essential features of Consciousness appear to be the non-stochastic features, the meaningful, the awareness and responsiveness, the purpose, the impacts and the influences on the individual and on every systems level of the collective units. In the living individual, there are biological impacts. On the other hand, at the quantal level there could be some level of reactivity. But this would be based on the attempts by the deliberate intention by humans to influence random number generators. If this were successful, it would change the previously stochastic results into a statistically non-random. This is what has happened showing that in some kind of way, even in subatomic particles, there is a reaction to specific deliberate outside stimuli. ²²⁵

Consciousness' is a key component of all models. Even beyond the more recognized neurological and psychological consciousness, nothing exists without some level of other 'consciousness' (quantized or extended).

Consciousness implies a major paradigm shift. No longer do we have the limited belief that the physical universe is primary and is all that exists. Instead, we recognize that physical universe is the small overt component of reality; and that consciousness at a higher level, sometimes not registered, is as important as matter, but even more so, this is the basis of the science of the future of which the Neppe-Close Triadic Dimensional *Distinction* Paradigm—more completely TDdVP— is a critical part.

WONDROUS GIMMEL: SECTION 8

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

By applying the empirical findings of chemistry and physics and mathematical equations, including new derivations, we extend quantum-to-molecular level analyses in a 9-dimensional spin model. Our current physics involving 3 dimensions of space in a moment in time (3S-1t) can explain a great deal, but there are some contradictions and unsolved problems that can only be resolved by applying a 9-dimensional spin model.

We have demonstrated the empirical necessity for a third mass-less, energy-less agent, substance, vehicle or process besides mass and energy, called "gimmel": No subatomic particle can stably exist without gimmel, yet gimmel is not measurable using the usual physical parameters of solely applying mass, energy, space and time. Mathematically and geometrically, atoms composed of quanta, and compounds composed of atoms, cannot be stable without gimmel.

This distinction of a third content (gimmel) in stable particles, exists at every level from the subatomic, such as in elementary particles like electrons and quarks, through to the cosmological such as dark matter and dark energy. It is key to maintaining stability and symmetry of subatomic particles, of atoms of the elements, of molecules and compound chemicals. Without gimmel, these substances could not maintain stability in our physical existence and would be ephemeral and transitory. In effect, we have empirically and unequivocally demonstrated that a third massless-energyless substance, called gimmel, necessarily exists ^{8, 9, 14, 15, 18, 19, 99}. We've realized gimmel is almost certainly either consciousness itself, or the vehicle that is necessary to express consciousness in the physical universe and possibly the infinite.

Gimmel, then, is not necessarily consciousness. It could be the template—the process that can allow for the manifestation of consciousness. In what we're calling vortical physics, the electrons and the up and down quarks are dynamically rotating in union with gimmel, but that does not mean that they are sentient, conscious entities. ^{18, 203-205} We speculate that consciousness might require meaningful impacts of a higher order of consciousness on the passively rotating quarks and electrons: Mass-energy-gimmel structure is passive in the sense of no activity or impact or influences; it becomes active when consciousness is conveyed into it via the agency of gimmel.

Gimmel is *not a subatomic particle*. But gimmel involves influences natural processes by being in union with mass and energy. Gimmel is not only in the physical 3S-1t, but it participates throughout the different dimensions of STC and, we

postulate rather cogently, it exists in the continuous infinite. We argue that it might originate in the infinite, and in that way existed before the Origin Event: Most regard that event as the Big Bang: but, because reality is infinite and the infinite involves all of time, it does not have a beginning. Exactly what is gimmel? ^{8, 9, 11, 14, 15, 17, 70, 100, 103} At one point, we thought gimmel was

the same as consciousness, but we could not define it as such, because people could argue that it could be something else: Could it be like gluons, just acting as a glue to complete the volume of protons and neutrons 9, 261, 262 and to hold them together? That is unlikely, because we've effectively shown gluons are mathematically incorrect. 9 Could it be just an operator to fill missing volume? No, it's not, because we know that there is an exact correlation of neutrons and protons and electrons and quarks with the figures from the Large Hadron Collider 18, 201-204 and that the atom (e.g. Hydrogen) exactly correlates in our TRUE analyses with Atomic Mass units. 201, 203 ^{194, 195}. However, there is an alternative: We just know that gimmel is an extra third substance which manifests in rotational volume, but does not contain mass and energy. It is the remarkable third substance that is necessarily linked with stable subatomic particles that are rotating vortically in three- dimensional directions that are symmetrical on their axis. ^{8, 9, 18} There must be an axial symmetry and this is attained by gimmel. Otherwise, this would not work out in math and geometry in 3dimensional or volumetric analyses. Otherwise, particles would simply fly away. 8, 9, ¹⁸ This symmetry is so even if the volume is not a perfect sphere (which it never is in our empirical reality). ⁹⁷ We know this mathematically because Fermat's Last Theorem would show that we could not get a cube that way. 263-265 So there has to be something else, and this is what we call 'gimmel'.

So we used to say, "What else can gimmel be but consciousness?" We now think that gimmel is a necessary but not sufficient component for consciousness. Gimmel is the vehicle by which consciousness comes into physical reality: It is the necessary vehicle; but one still has to have that 'spark'—maybe that 'Godly spark'—that impacts and that influences, at every one of these EPIC levels. So, in the finite and transfinite, we cannot have consciousness without gimmel, because at that fundamental level we need a third substance to produce stability and symmetry.

Today, we would argue the logical role of gimmel is that of an agent of consciousness, rather than consciousness itself because we can more easily measure gimmel. And we can find that it has that correlative role in Dark Matter and Dark Energy ^{9, 11, 12, 18, 204} ^{8, 14}. This raises the whole question of what consciousness or gimmel is. Could it be 95% of our cosmos is gimmel or is 95% just in conjunction with the Dark substances. But we might be able to have consciousness without gimmel as a measurable parameter in that external, infinite component—and, indeed, we have hypothesized that gimmel emanates from the infinite ^{8, 9, 11, 12, 70}. For

example, we have argued that the photon at the infinite level likely has an infinite amount of gimmel. ⁹⁷ By the time it reaches our 3S-1t level as light, it exhibits the same amount of gimmel as the electron—as in Einstein's photoelectric effect. ¹⁴² Importantly, again, all of this is volumetric—it has volume and is always spinning in three directions, and therefore it is vortical, involving fundamental shape rotations. ^{18, 85-94} And this is why calculations in our real world involve rotational stability.

As indicated, the question arises whether the gimmel in union with elementary subatomic particles like quarks and electrons and with photons exhibit some rudimentary consciousness. We used to argue that they did, because this would mean a progression all the way through our particle universe at the quantum level going upwards. However, we know that results are not stochastic: In other words, there are times when these particles are not random suggesting something promoting logical structure is happening, either from within the particles themselves, or from impacts from the outside. Photons are energy, but effectively massless, subatomic particles. We postulate there is an infinite amount of gimmel in union with photons in the infinite reality, and the same amount as for electrons – namely 105 gimmel TRUE units (GTUs) reflecting quantum equivalence units in the finite 3S-1t.

There is some supportive data when we calculate the Gimmel scores of quarks which, for the same kind of up or down quark in proton and neutrons, range from 1 to 6: Why are they different?^{18, 94, 201-204, 8, 70, 100, 103 70, 71} We don't know. We know only that certainly something works through the human observer to impact on quantum data. We know this based on RNG data. And, in that instance, gimmel works through the human to impact on quantum data. We call that component of so-called gimmel that is contained instead of the neutron in hydrogen 'daled'. Is daled a separate property or property to gimmel? Or is it just some other way to conceptualize gimmel? We don't know. But it is legitimate to regard it as separate, though not necessarily appropriate. Gimmel is also in union with photons in the infinite continuity: We've hypothesized the photons then have an infinite amount of Gimmel TRUE units (GTUs). However, in the discrete (quantized) finite, the photonic state is different: photons must be in union with the *same amount* of GTUs as electrons, because of electron involvement in the photo-electric effect ¹⁴².

Gimmel's properties appear to range all the way from the subatomic (in quarks and electrons) to the cosmological, impacting dark matter and dark energy, too. ^{11, 12} In tethering, components—such as substrates in space and time—are inseparably attached to each other at one or more roots. Union implies more gimmel, where we describe mass and energy. This is the Mass-Energy-Gimmel Triad. Just as Minkowski spoke about "no longer will space and time be separate, they will forever be a union" ⁵⁶, gimmel too is always a union: a 'hovering over' of mass and Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). *1QNJ. 10 2: 7-108. 2018. V8.414 18091411v180619* © *Vernon M Neppe and ECAO*.

energy with gimmel.

When assessing the value of a concept, we like to find one that has appropriate application. Gimmel appears to come out unchanged in terms of reactions. Sometimes this might even involve so-called beta decay in the relationship between, for example, the neutron and the proton. A chemical that comes out unchanged in reactions, but impacts that reaction, for example, by speeding it up considerably, is called a 'catalyst'. And we have postulated that gimmel is a catalyst. The parallel might be extended here, where the catalysts are reflecting the good parts of the decay reactivity. ^{18, 85-94}So what do we know about gimmel? We know that gimmel:

- is the hidden but necessary fabric of reality;
- is correlative with Consciousness, but it may just be the vehicle;
- is an extraordinarily important concept that has allowed a major advancement in TDVP;
- has been the last bastion to conquer in TDVP because the 'Extent' in dimensions now incorporates the content in gimmel ii 9;
- has specific numbers of 'gimmel TRUE units' (GTUs) in atoms made up of protons, neutrons and electrons. These can be calculated and varies with each element and compound (one made up of two or more elements united in specific proportions): all stable subatomic particle have specific but different GTU scores;
- is very versatile: We have now authored many articles on gimmel ranging from the Periodic Table, to gluons, to Dark Matter and Dark energy in the cosmos, to the contents of atoms ^{11, 12, 15-17, 70, 100-102} (Close and Neppe, 2016);
- different Gimmel TRUE Units (GTUs) scores exist in each of the 6 up-quarks and down-quarks. This is not just illustrating a principle here. ⁹ It also implies that even though we 'label' all up-quarks and all down-quarks as the same because they have the same mass, they are subtly different. This is likely to have important applications for every quantized object. An electron has far the most GTUs (105);
- is argued to be a necessary part of the content of stable structures that are symmetrical at their axes—in other words, they are stable over time as opposed to subatomic particles that are ephemeral. Some of these particles are sustained over time, but for a short time, such as the neutron, which has a half-life of 10-15 minutes (depending on the study) 156, 266-268, but uses gimmel;
- even when an ephemeral subatomic particle is attached to a stable particle, gimmel becomes part of that union, e.g. the neutron becomes part of the union with the proton, or the neutrino or the positron: at that moment in time, they are not

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ⁱⁱ The amount of gimmel units is fixed with each subatomic particle. For example, remarkably, the tiny electron is in union with 105 gimmel TRUE units (GTUs). There are also different GTUs for each of the 2 down-quarks and the one up-quark in neutrons; and again, different GTUs for the protons, which are made up of 2 up-quarks and 1 down-quark. Consequently, each of these six has a different numerical equivalence of gimmel.

necessarily unstable ^{18, 201-205};

- a potentially massless, energyless (maybe) particle, such as the gluon and the Higgs boson or gimmel itself, is likely not in union with gimmel:
- might not be linked with all particles: there is a need for mass, energy and likely stability as the ephemeral particles are unstable;
- we think, may be a necessary vehicle, but not sufficient component,
- exhibits its union property, like an arm to a body, in all stable subatomic particles;
- is not only a container (content) but shows extent;
- might be the *consciousness impact potential*. Thus, gimmel has 3 different qualities—*content, extent, and impact*;
- might only exhibit impact linked with the presence of consciousness;
- contributes to stability, but it cannot be directly observed or measured.

The beginning of finite time: Was gimmel always present?

We think gimmel was maybe the first of all the components of finite reality that were present. Gimmel preceded mass and energy and therefore preceded the finite existence of the Big Bang or other 'Event Horizon'. ⁷

Biblically, in Genesis 1:2, there is the Hebrew phrase *tohu u'vohu*. This sometimes is translated as a 'formless and nothingness'. These two terms do not exist elsewhere in the Bible, or in regular Hebrew, and appear to have been mistranslated into the English. Based on detailed study, including commentaries, we strongly argue that '*vohu*' is actually gimmel. This *vohu* is linked up with the *tohu*, which is why they might appear together. We propose that '*tohu*' is the precursor of what would later be the formed mass and energy: At that point in time, before the Big Bang equivalent, *tohu* was just that formless component that needed gimmel (as '*vohu*') to become mass and energy, as we know it: We have proposed that TDVP ⁷, with conservation of gimmel and TRUE as a recent axiom, and with ordropy ⁷ and the infinite ⁷, implies that the existence of the cosmos was never a 'nothingness'. It was never 'something (such as the Big Bang and our universe) 'out of nothing'. *It was always something infinite before. We know that 'gimmel' fills this requirement as a foundation of our studies. We further base our opinion on the whole context of Genesis Chapter 1: 1-4. This is an illustration of how spirituality can directly support science.*

So, to answer the question: Yes, gimmel was always present in the finite and even before that, otherwise the second law of thermodynamics would have precluded the formation of any stable structure. It also manifests itself in the infinite continuity. The finite began with the Big Bang or equivalent Event Horizon, and therefore already had 'gimmel' (which is the Biblical term 'vohu'). And our intuitive title for our book, Reality Begins with Consciousness 7, appears to be correct. That beginning is in the finite level of existence; the infinite continuity is without beginning and without end.

UNIFIED MONISM: LINKING SCIENCE WITH SPIRITUALITY IN A PHILOSOPHICAL MODEL: SECTION 9

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

Unified Monism as a philosophy and Triadic Dimensional Vortical Paradigm as a mathematicological empirical scientific endeavor both to unify *Science and Spirituality*. The component that is relevant is the linkup with the infinite, particularly. Unified Monism (UM) describes a viable and versatile mind-body philosophical model ⁴⁶. It was developed as a logical consequence of a verified 'metaparadigm' 'theory of everything' that scored a perfect 39/39 and that applied scientific empiricism, mathematics and logic. ²⁶⁹ It is based on the 2011 Vernon Neppe and Edward Close⁴ Triadic Dimensional Vortical Paradigm (TDVP). It is remarkable that both Drs. Neppe ^{4,95} and Close ²⁶ quite independently developed the same philosophical concept, effectively referring to Unified Monism, even though it did not exist and we are only now defining this new philosophical model!

UM is likely the first philosophical paradigm that is strongly based on a comprehensive scientific model. Almost certainly it is only one where the philosophy develops out of necessity based on the sciences. Unified Monism was borne out of necessity and is unique: It makes sense in the physical reality plus in the infinite. UM describes how *this monistic model is unified for two reasons*:

- 1 The essence of reality is *unified* with Space being contained in Time, and Time being contained in Consciousness (STC): they're always partly tethered together.
- 2 Moreover, the quantized discrete finite is completely embedded in the infinite continuity. There is only one reality.

No other model in this context makes sense under every circumstance. Effectively, Unified Monism is the philosophical endpoint of science and mathematics. UM effectively portrays the Science and Mathematics of TDVP. ²⁶⁹ Unified Monism incorporates all—the physical and the non-physical (in other words, the so-called mind or consciousness.)

We living beings can only experience a tiny portion of the finite, namely *restricted* three dimensions of space (physical length, breadth, height) in a moment in time (the present) (r-3S-1t). It is 'restricted' because we cannot even experience all of 3S-1t: Dolphins can echolocate; and dogs have powerful olfactory abilities; and at the physical level, we cannot directly detect infrared or ultraviolet or microwaves. Given these restrictions in 3S-1t, it may not be surprising that there are other 'higher' *Neppe, VM; Close ER.* Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). *IQNJ.* 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

dimensions (above 3S-1t) that we cannot detect directly. But it does not mean that we cannot react to them. We react to the ultraviolet of the sun in 3S-1t. We can detect more information through X-rays.

The rest of existence beyond 3S-1t is hidden, though other states, such as altered states of consciousness, may involve other dimensions and other experiences. We can achieve different states though dreams and through meditation for example. Are these different dimensional states? And how do we conceptualize the out-of-body experience, precognition or remote viewing?

Only our very limited quantized (discrete) finite vortical (rotating) reality can ever be directly experienced, yet the infinite always pervades existence at every level in the finite, including our physical reality.

'Unified Monism' is the necessary philosophical consequence of TDVP, not a primary metaphysical or philosophical conceptual model. Like Kabbalah and TDVP, some of the Eastern mystical philosophies (e.g., Vedic varieties) recognize the unification of reality, the infinite subreality, the broader role of consciousness and a higher guiding element. But they do not have the math and science to justify the concepts.

Unified Monism is not a tautology. It reflects one essence ^{jj}, with the necessary third substance 'gimmel' (the vehicle for consciousness) in union in every atom, otherwise without that stability, the world would fly apart and be unstable.

Effectively, UM is a very versatile monist philosophy, and works in 3S-1t, 9 dimensions, the transfinite and the continuous infinite. All of reality is a single unit, hence the term 'unified monism' ²⁶⁹.

UM applies a top-down approach that includes non-material and material information and does not differentiate mind and body, as all is *the same spiritual essence*. Just the bottom—the overt 3S-1t physical mass-energy aspect is *experienced* directly, but most of the non-material higher dimensional domain *existence* is hidden. The extended consciousness, for example, is just reflected in dimensional domain differences, always embedded in the infinite continuity.

The embedding within the infinite means there is no area of necessary interaction—the finite and infinite exist as a unit, hence, again, the philosophical term of Unified Monism: There is no 'mind-body' or 'consciousness-substance' duality. In our Table, we contrast UM with some major philosophical perspectives. This table is not meant

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^{jj} The identities of all individuals through their 9 finite dimensions to the infinite. Fundamental nature includes infinite space, time, consciousness, information, order and life.

to be all-embracing, but to give a perspective.

UM is *not* 'metaphysical' because it developed out of science: a secondary derivation of the metaparadigm that is TDVP that unifies the science with the spiritual essence including the infinite. UM involves common sense. Unlike many idealism models, there is no semblance of a virtual reality.

Our discovery of gimmel, allows for an awareness that gimmel preceded mass-energy in the finite Event Horizon or the Big Bang. Hence, everything naturally existed together from the beginning of the finite, hence the title *'Reality Begins with Consciousness'* (*RBC*) in the Neppe-Close book on TDVP. ⁷ This implies that consciousness at that level was 'primary'. kk

Neither TDVP nor its philosophical derivative UM have a problem with survival after death or with psi or with meaningful evolution or even reincarnation or with a G-d that dynamically impacts and acts. There is no need for emergence, epiphenomena or derivativeness or virtual realities. All seamlessly fit.

On the other hand, using Unified Monism succeeds and can imply a theistic base. It means that there is an interactive communication across to G-d, at a theistic level. That everything is unified. But there's also an interactive communication across physical particles: events such as earthquakes, volcanoes, tornados. Even simple speech communication can be covered. ²⁷⁰ In fact, any and all physical events could also be included such as normal weather, the tides, a rock rolling down a hill, and leaves falling. Therefore, not everything in Unified Monism is just a linkup of "we are part of G-d" as in a pantheistic view where G-d is *in* everything (or G-d *is* everything as the more extreme version); or in panentheism, where there is at least a tiny component of G-d in all. Pantheism and Panentheism are compatible with our Unified Monism and contained in it, but not vice versa.

By contrast, some consciousness researchers have shifted towards a variant of *idealism*. Berkeley initiated it, but there many different adaptations. In some, each individual might have its own existence, and in others there are commonalities to this Idealistic Monistic philosophy that may or may not have virtual imaginary aspects. The problem with this Idealism is if I am the only individual who actually is registering all of this, and my whole world is a fantasy, it might imply that I have invented such a world, that I have conceived of all of this. If this is so, it would imply that "I am G-d. But I have news: I am not G-d!" And therefore, this whole *idealistic perspective* in terms of some kind of 'virtual reality' fails. Whereas pantheism does not recognize *any personal relationships outside that range of G-d*. Unified Monism does: the earthquakes and the millions of other natural events, the simple speech communications, the free-will, and the freedom of action.

kk Dr. Ed Close in his book Transcendental Physics used 'primary consciousness' as his term for G-d.

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UM both implies and requires infinity. Serious thinkers since classical times have debated the existence of *actual* as opposed to *potential infinities*. Infinity is both. There may be the potential when applying it from the framework of our physical 3S-1t domain, but it is actually demonstrable mathematically. ²⁷¹

The 'infinity' in Unified Monism reflects both the physical and the non-physical because at every level of existence, the finite is mirrored through the infinite, because it is embedded in it. The finite and infinite are not separate, but unified though we can only experience tiny portions of the infinite through a relatively tiny prism of our experience. Metaphorically, the finite is mirrored by the infinite at every series of dimensional levels. This implies levels of infinity, sometimes called the 'infinity of infinities', most famously by Georg Cantor. ^{271 II}

We can conceptualize our physical reality through Unified Monism. We can understand how a single finite-infinite reality can unify everything. That UM unification of everything incorporates pantheism and panentheism—but it is more than both because the infinite laws of nature reflect an all-encompassing, preeminent, active G-d at many levels of the infinity of infinities. ²⁷¹ Essentially, Unified Monism is the only mind-brain philosophical model that can be applied to every level of mass, energy, finite, infinite, physical reality, infinite and higher dimensions. Unified Monism is consequently far broader than any other mind-body philosophical models. UM seamlessly justifies our regular day-to-day reality experience of physical reality involving three spatial dimensions in a moment of time. It also allows for experiences in all dimensions of time, space and consciousness, as well as in the infinite. Moreover, it seamlessly fits with all levels of consciousness and survival after death plus allows for altered states of consciousness, psi and a G-d.

The concept of UM is well supported in detail and allows a different perspective from the many philosophically restricted options of 'Consciousness is derivative of Space-Time or Mass-energy' or vice versa. ⁴⁶ For example, Panpsychism, originally from of Thales and Plato, bears some resemblance to UM and has become possibly the most fashionable mind-body solution. Consciousness necessarily exists in all matter. The problem is whereas Panpsychism can be applied to anything physical and even can postulate subtle consciousness to explain such events as out-of-body experiences and ghosts, panpsychism fails dismally in explaining real survival after bodily death ²⁵¹ ²⁵²

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^{II} However, the infinite, by virtue of its extension forever in time, space and consciousness, and being a never-ending repository can be conceptualized as a unit, perhaps only experienced by a Divinity. That Divinity may be regarded, in that sense, as the Infinite. The Hebrew for the 'infinite' is 'Ein Sof' which means without end: G-d is sometimes used synonymously with this.

^{139, 141, 226, 253-260} where there is no body or subtle energy.^{mm} UM has no such problem with post-mortem survival, or for that matter, reincarnation—if that is needed to be postulated (an option for explaining).

Knowing from TDVP that there is a hierarchy of dimensions in a single essence, allows for explaining survival in any way as part of that hierarchy by simply applying the appropriate extensions of finite dimensions (for example, some kind of survival might involve the dimensional domains of dimensions 6, 7 and 8 (we don't know which) Moreover, the experient (observer) at all times is also mirrored by that level of the infinity of infinities that is commensurate with their real essence (in this example it would be that finite dimensions 6-8 would be mirrored in the infinite but the experient could only experience that tiny portion of the infinite not all, and even that only indirectly through that mirroring of the finite. Survival after death, or before life for that matter, could even involve some of the transfinite dimensions, in which case the mirroring to the infinite would be at the appropriate transfinite level. All of infinity extends forever, and though experients never directly might experience all of it even as a mirror only, their finite existence is still embedded in the infinite. This is an essential difference from e.g. panpsychism: the finite dimensions and the infinite are inseparable units in existence, like a hand as part of the arm.

In a way, panpsychism is similar to Pantheism, as exemplified by Spinoza, where effectively G-d or a deity is in everything. Consequently, the *creator is contained in all infinite dimensions* instead of consciousness being in all.

Panentheism is a variant and extends Pantheism, and is a belief system which posits that the divine – whether as a single G-d, number of gods, or other form of "cosmic animating force" – interpenetrates every part of the universe and extends even beyond time and space.

When we compare UM to Panpsychism, or Pantheism, or Panentheism, or any other philosophical model, or to Galen Strawson's *Realistic Materialism* ²⁷² or his father's Peter Strawson's *Realistic Monism* ²⁷³, or to applying *Cartesian dualism* ²⁷⁴ or *promissory dualism*, or the *transcendental materialism* of Zeno, Chryssipus and Betty ²⁷⁵, it's no contest. Unified Monism fits all of the 20 plus criteria of comparison and is very versatile. ⁴⁶ (Neppe and Close, 2011).

Unified Monism is, therefore, a versatile theistic philosophical model that is based on empirical science, our physical world, recognizes higher realities that are unseen, and recognizes non-theistic components, as well. Everything in our reality is unified and our links with others are consequently profound.

mm Some have even postulated a far-fetched equivalent of some kind of eternal connecting cord from the physical body to the surviving entity, but even then, how would that cord explain independent communications between the living and the dead? Yet, such communication is well described. And a cord cannot explain independent post-mortem existence.

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UNIFYING SCIENCE AND SPIRITUALITY: KABBALAH AND JAINISM: SECTION 10

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

It is remarkable that after developing the complete TDVP model in 2011, we discovered, post hoc, that Kabbalah is profoundly similar to TDVP. ⁸¹ But Kabbalah is a philosophy with slight mathematical implications; TDVP involves significant and proven mathematical implications and applies a scientific method can be translated empirically into real testable hypotheses, that have been demonstrated.

We have only recently learnt about the similarities of another ancient philosophy, this time an Eastern one, namely Jainism. However, Dr. Close has been actively involved with several of the Eastern philosophies, yet we've not before encountered any that are more similar to TDVP than Jainism. In contrast with Kabbalah, where it is difficult to find areas of contradiction, there are limitations in Jainism, mainly relating to the absence of monotheism and therefore direct prayer to a G-d and responsiveness.

We provide five 'exhibits' to justify linking TDVP with spirituality, specifically in this instance, Kabbalah with a possible assist from Jainism and other theologies. These are examples to be accepted or rejected. But either way, they are truly remarkable.

Possibly the great 19th century psychologist, William James, in 1897 ²⁷⁶ expressed it best:

"In psychology, physiology and medicine, whenever a debate between the mystics and the scientifics has been once and for all decided, it is the mystics who have usually proved to be right about the facts, while the scientifics had the better of it in respect to the theories." ²⁷⁶

EXHIBIT 1: OVERT AND COVERT: MOVING ACROSS DIMENSIONS.

- A key component in TDVP is differentiating the *overt and the covert*. Our overt reality is our physical reality that we experience and generally directly in 3S-1t. The physical 3S-1t domain reflects our experience with relatively little consciousness, but our covert existence extends far beyond 3S-1t for example to a 9-dimensional level or to an infinite level.
- There is only a relatively small amount of 'consciousness' expressed in our physical reality of 3S-1t, as that is almost exclusively neurological and

- psychological, and likely quantal. ^{7, 147} Our extended consciousness is expressed generally at a higher dimensional domain level. ¹⁴⁷
- Our experiences from the framework of even 3S-1t and certainly higher dimensions, are not only individual, but has 'individual-unit 'systems experienced multiple group levels like cultural, social, ethnic and spiritual. This 'systems approach' is fundamental to TDVP reflecting extending outwards 'horizontally', in addition to the 'vertical' movements across, within and between dimensions. Interestingly, many philosophies including Kabbalah ²⁷⁷⁻²⁸¹ and possibly Jainism and other eastern religions also recognize the Systems Approach.
- So we differentiate *experience* from *existence*, and experience is dependent on the dimensional domain we're in. The hierarchical lowest domain is this physical existence where we only really experience space in a moment in time, and we understand mass and energy, but we don't really experience anything but our neurological consciousness. Consciousness is not easily expressed while alive, because it's happening at a higher level, non-experiential but existing level.

EXHIBIT 2: GENESIS: THE FIRST THREE SENTENCES; SOLVING AN AMAZING BIBLICAL MYSTERY. TRANSLATING SCIENCE AND TDVP DIRECTLY.

- Consciousness, then, may be more than just a substrate like space and time and more than just an equivalent content to mass and energy because all is blanketed by consciousness. Consciousness "hovers over" everything, reflecting a unification of the science and the spirituality.
- We amplify a previous section. We clarify below, using Kabbalic thinking as an example, and quoting Biblically in the original Hebrew from some remarkable scientific parallels. The first three sentences of Genesis 1: 1; 1-3, are remarkable.
 - Einstein's E=Mc² uses different Hebrew terms and metaphors: *Barah* (created) would refer to equals (=); *Shamayim* (heavens) implies energy (E), *Aretz* (earth) signals mass (M), and *Or* (light) is repeated twice as light speed squared (c²). ("*Let there be light, and there was light*").
 - We realized that if E=Mc² was in those sentences, there had to be consciousness as there is multidimensional time and consciousness at higher dimensional domains. *Consciousness* had to there for this to be spiritual. And it had to be there *twice* because we postulated it should be on both sides of the equation on E=Mc² *in some way on both the E and the Mc² side*.

 TDVP would be enhanced by that. And if this were correct, theologians may recognize this happening deliberately in the bible. We examine if this happens:
 - In Genesis 1:1: 2 the sentence is '*Ruach Elokim*'. ('The spirit of G-d', implies consciousness. But where is that second Consciousness in E=Mc²?
 - Recently, after discussion, we've postulated in TDVP that everything is

blanketed by consciousness. Carefully analyzing (Genesis 1: 1 verse 2 l) the term *M'rachefet* this was the second Consciousness reference. *M'rachefet* is unique because it only appears there. It refers to *M'rachefet al p'nei hamayim* "hovering over the face of the waters". This phrase reflects the start of the finite reality and Consciousness (or G-d?) hovered over all of it, far more than just mass energy. Remarkably, too, water contains a great deal of gimmel, the highest proportion of gimmel of any compound molecule. And the root in Hebrew of 'm'rachefet' contains the same two letters of 'ruach', though grammatically in Hebrew, that could be considered a stretch.

• Spiritually the realization that consciousness hovers over everything produces an awareness of the relevance of this shift in human consciousness. Those who experience it, such as Near-Death Experients (Experiencers), frequently have their lives changed forever. ²¹¹⁻²²⁰, Maybe the world will be a far better place when others realize this, because a certain higher or spiritual consciousness is transmitted: Perhaps this is the extended or higher or Infinite Consciousness.

But to justify this further, we needed to locate Gimmel as the source of consciousness in these lines in Genesis, preferably in the same sentences.

- $E=Mc^2$, the famous formula popularized by Einstein with the Lorentz component, is very relevant and remarkable, but the question comes up, *this is only mass/energy: What about gimmel?* We know that $E=Mc^2$ is relative to the 3S-1t domain: there is very little consciousness at that level; at higher levels, there's a lot of consciousness, with the consequence that this must be very different. It might be that we have to add in consciousness (or Gimmel) into the equations of physics.
- When one looks at this Kabbalistically in terms of Genesis chapter 1, particularly verses 2 and 3, there is the term *tohu u'vohu*. (1:1:2). Again, this phrase is unique and subject to translation interpretations.
- *Tohu* is usually incorrectly translated as a 'void'. The correct interpretation (we argue) is 'formlessness' as 'tohu' precedes finite mass-energy implying that at the start (*B'reishit* in the beginning 1:1:1) that mass and/energy were not yet *physically* formed but *existed in some way*. This corresponds with our TDVP description of how *reality begins* only in the finite, but the infinite precedes the finite ⁷ and exists for all time, hence "*Reality Begins with Consciousness*". ⁷
- Similarly, the term 'vohu' is sometimes translated as 'nothingness'. With respect, Neppe regards this as markedly incorrect. The term 'vohu', we argue, most likely describes gimmel—the massless and energyless third substance. We postulate gimmel was at the beginning prior to mass and energy being formed because mass-energy needs to be in union with gimmel. And why was it there? Maybe, because it reflects spiritual consciousness. Why otherwise would the

- book of Genesis (G-d?) even *include two words here (tohu, vohu) if describing* only one kind of 'formlessness' or 'nothingness'? To theologians, this duality might never have made sense before, but with the discovery of the infinite spiritual gimmel (Vohu), that is absolutely necessary for primordial mass and energy (Tohu) to produce a stable finite physical reality, it makes great sense.
- Gimmel then allows for the waters to develop form because the *M'rachefet*, the 'hovered over' component (*al-p'nay hamaim*—'on the face of the waters') can be understood to reflect the finite, physical reality, and the waters with infinite gimmel. Prior to that there was just darkness on the face of the formlessness (*Choshech al p'nei tahom*. 1:1:2) so the role of 'Or' (light) becomes pertinent.
- Moreover, that *M'rachefet* is also linked up with the *Ruach Elokim*, which means 'the spirit of G-d'. That allows the concept of spirit to be on both sides of the equation. The conceptual jump here equates Consciousness with G-d.
- And finally, with the mention of 'square of the speed of light' in the Einstein e=mc² equation, the light referred to could be what Kabbalistically is called the 'Or Ein Sof' (which we would translate as the light of infinity emanating to the finite; this in physics involves the photon and we have postulate that the photon as a fundamental energy source at the infinite contains infinite amounts of 'gimmel' (or consciousness or its vehicle).
- So even e=mc² already could *imply* the presence of 'consciousness'—'gimmel' or 'G-d'. Yet, examining the original Hebrew in Genesis and scientifically applying the terms, we might have esoterically located more: Ruach (spirit), and M'rachefet (hovering over; but containing that spirituality) support each side of the e=mc². The most gimmel in all compounds is the Mayim (water).

Reading these three sentences in the original Hebrew and recognizing the amazing links is simply breathtaking. Unfortunately, translation to English or any other language loses the nuances. Is this all coincidence or is this something more?

EXHIBIT 3: INFLUENCE AND PRAYER

- We've discussed the role of influence and prayer in consciousness definitions and that it is fundamental to the Calculus of Existential Distinctions in the TDVP model. What is a spiritual parallel?
- Influence and prayer are also extremely important in Kabbalic mysticism, because unlike, for example, in Jainism ²⁸², there is an impact on reality; and that impact is a significant one. It can be an impact, an intent, and an influence; and prayer could be one component of this in relation to a deity.
- Impact can also involve a role of influence and a role of prayer. So, this is bidirectional with receiving (the word *Kabbalah* means receiving) and giving (G-d?).
- But influence and impact are not necessarily induced by or with a divinity. Impact could also involve, for example, earthquakes and other physical phenomena.

EXHIBIT 4: LINKS TO TDVP AND KABBALAH AND JAINISM

We quote Albert Einstein's comment again: *Science without religion is lame. Religion without science is blind.* ⁵¹

Can we broaden our science including TDVP, Dimensional Biopsychophysics and Consciousness Research? Searching for a possible linkage, Kabbalic mysticism has strong philosophical similarities to many of the philosophical aspects of TDVP. ²⁷⁷⁻²⁸¹

Kabbalah with TDVP

Kabbalah is an ancient mystical tradition, originally Jewish. Some have proposed it has its origins almost 4000 years ago with Abraham. The fundamental tenets have not changed, despite a profusion of mainly poor books misinterpreting the subject.

The closest mystical model to TDVP (with its unification of the STC triad) appears to Kabbalah. Theoretical Kabbalah scores 19/39.^{278, 280, 281, 283-286} This is the highest theory of everything score except for the work of Neppe and Close. ⁷ There are several criteria that scored question marks and this is common in many mystical philosophies.

There are numerous major similarities with Kabbalah and TDVP. This is outlined in *Reality Begins with Consciousness*. ⁷

Dr. Neppe has furthermore very recently produced a lengthy video discussing the links of TDVP and Kabbalah. ⁸¹ Kabbalah, science, and spirituality with Vernon Neppe. https://www.youtube.com/watch?v=tXO6mUUUGsE

There are three kinds of Kabbalah, which likely reflect principles from many religions or mystical philosophies:

- Theoretical-Religious Kabbalah: This involves the theory and knowledge (focused on here). How does a philosophy contribute to science, and vice versa?
- Meditational Experiential Kabbalah: This is the practice. This may reinforce belief systems and one might learn some valuable approaches.
- The Magical Kabbalah: These aspects are very diverse. This is linked with ritual and belief.

It's remarkable how closely Theoretical Kabbalic mysticism fits with TDVP, though very esoteric, based on philosophy and not therefore developed scientifically and mathematically. ²⁸⁷

In Kabbalic esoteric sourcesⁿⁿ, there are descriptions of "vortices" and likely tethering. Similarly, though one does not interpret or conceptualize "dimensions" as TDVP does, the ten Sefirot and four higher levels and some external concepts are described in Kabbalah. In addition, the descriptions of eternal time concepts with infinite time in the Divine, implies Multidimensional Time. Aspects of reality are directly revealed to us, yet others are hidden.

In these examples, we have emphasized Kabbalah (as opposed to Vedic thought ²⁸⁸) because of the fundamental Triadic emphasis of Space, Time, and Consciousness. Kabbalah moves through different infinite dimensions, and describes even ordropic processes, and meaning relating to ordropy.

Jainism and Kabbalah

Interestingly, one can draw some remarkable parallels between *Jainism* and TDVP, and also certainly between *Kabbalah* and TDVP—because there are so many areas of commonality between Kabbalah and the Neppe/Close paradigm, and yet there the ancient Indian philosophy of Jainism also is strongly linked.⁷

The nature of mysticism is simply difficult to quantitate and to conceptualize consistently. The mystical models are also in evolution e.g., in Vedic mysticism, it appears the mathematics was worked out much later. We have not yet analyzed Sufic or Tantric or Sankhya philosophy, but Jainism traditionally known as Jain *Dharma*, is a pre-Vedic ancient Indian religion. Jains believe that Jainism is an eternal dharma guiding of every cycle of the Jain cosmology. Vedic thinking appears, too, to be esoteric, ambiguous and variable. In Jainism space, time and consciousness are not explicitly separated but the 'soul' is primary and there are varied interpretations. Jainism does not regard mysticism as important, but only as by-products because the object it to purify and develop the soul.

However, in both Kabbalic and in Vedic thinking, it's difficult clarifying many areas as there are ambiguities in the philosophical interpretations, as well as differences in terminology so that comparing similar concepts is sometimes difficult. Also, it is particularly difficult to score spiritual ideas and the metaphorical interpretations. Moreover, scoring is further complicated because their concepts have limited ability for scientific validation, and because of their esoteric, mystical, not scientific origins.

nn Kabbalic and Vedic mysticism demonstrate important similarities, e.g., with their common broader conceptualizations of Infinity, Consciousness, Divinity and Origins. More esoterically, some interpretations of Kabbalah involve vortices, for example, in the Sefirot; and some Vedic masters could claim vortical shapes. Historically, both Kabbalah and Vedic thought are very ancient, but because of the oral traditions being handed down, and not the written elements, the exact detail originating in those time periods are nearly impossible to prove. Nevertheless, Wolf describes the first Kabbalists, including Abraham, from 3300 plus years ago. Some migrated East to India and surrounding areas. There are numerous remarkably common linguistic terms in both, possibly as a consequence.

Jainism

Could there be positive influences possible even without a Divinity—a God? It appears so, as this is one aspect of the philosophy of Jainism. ²⁸⁹⁻²⁹¹ However, there are hundreds of examples in Jainism of several different kinds of deities. These appear to be gods who are worshipped, hence the term 'Trans-deism' may be appropriate. Moreover, Jainism involves 'gurus' who have 'highly developed bodily souls' and who can influence the less developed souls by direct and indirect communication between the two. There are known mystical powers of 'labdhais' and 'siddhis' oo through which many 'miracles' can be carried out by that 'guru' who might not necessarily be physically present, or even alive. However, there are no G-d like elements involved. The guru can only transmit to less developed living 'souls' to help after they've requested it through prayer. Physicist and Jainism expert, Dr. Pokharna has indicated the mechanism is unknown ²⁹², but this is more than just psychological elements. In emergencies, these powers can be used to positively influence others unidirectionally. Jainism therefore involves influence, but does not involve G-d. Pokharna has shown several other remarkable links of Jainism with TDVP, to the extent that he has written a paper on it. ²⁹² There appear to be *two major* differences, but these two differences are dramatic.

Some would describe Jainism, as atheistic, but a minority regard Jainism as a kind of *trans-deism*. Nick Dutch ²⁹³ points out that trans-deism rejects the doctrine of gods, instead there is a rational spiritual truth which is *out there*, one not involving theistic revelation or deity-intervention, and that is fundamental to the impact and influence distinctions of TDVP. Yet the gurus effectively do a similar job. ²⁸²

- Jainists aim at asceticism and spirituality. They strive to live as good a life as possible, and to take responsibility for their actions. But these positive behaviors are not based on a g-d: Man has 'pure' complete responsibility for his actions. ²⁹² This contrasts with Kabbalah, in which a direct and important interaction, with the infinite (Ein Sof) that is perceived by some as G-d.
- These are the two major differences: the influence, in terms of Kabbalah and the theistic element. This links up with TDVP, because we've seen the need for consciousness—for meaningfulness, and for non-stochastic phenomena, the impacts in terms of prayer, in terms of the calculus of distinctions 82-84 and that makes Kabbalah a close candidate for comparison with TDVP.
- Jainism *might appear* different from TDVP because despite the numerous different parallels, an important element for consciousness, spirituality and prayer is that *we can* impact *and* be impacted *bidirectionally*, and we can *influence* even at the *quantal*, subatomic levels. However, the anecdotal data in Jainism might still support the prayer responsiveness dichotomy, but because of the apparent absence

oo 'Labdhis' and 'siddhis' are special faculties of highly developed mystical Jainist souls while physically alive. *Neppe, VM; Close ER.* **Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP).** *IQNJ.* 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

- of a deity, there may be different terminology and bidirectional impacts might be perceived differently, though the principle may be equivalent. ²⁹²
- But in Jainism, like Kabbalah, and mystically perhaps intended in TDVP, there is a growth. This is a spiritual growth in terms of achieving higher spiritual levels, but in Jainism, it is purely man-induced or group related, but still with influence or impact. The gurus can show the right path.

The infinite in TDVP science, Kabbalah and Jainism

- The infinite is a difficult mathematical and scientific concept, and generally neglected because of the challenge it affords to understanding. But with respect, both Neppe and Close have together worked with this scientific and mathematicological concept. Moreover, prior to that they independently worked on infinity for more than two decades. ^{39, 136-138, 151, 294-302}. They have built on the great work of the eminent authority on infinity, Georg Cantor. ²⁷¹ Scientifically, Neppe and Close argue the infinite-finite union may involve the functions of photons. They speculate photons ^{303, 304} are in union with infinite gimmel in the infinity, and yet in the finite that same gimmel in photons is only equivalent to the amount of gimmel in electrons (105 GTUs). They project from Einstein's photoelectric effect with electrons. ¹⁴²
- Infinity is fundamental to Kabbalah with terms like Ein Sof (without an end) being synonymous with the infinite and disputably sometimes with G-d. The communication with the infinite and the finite involves the 'Ohr Ein Sof' (literally, 'light of the without an end'). This is not a dualistic communication but descriptively from G-d and a direct emanation to the physical. Infinite intuition might be linked with *Chochmah* in Kabbalah. There are 5 levels of the soul in Kabbalah and these can be exponentially increased ad infinitum because the one is contained in the other. For example, there are five 'soul' levels each different and each mathematically containing the others, ad infinitum. They are Nefesh including the bodily animal and G-dly soul, *Ruach*—the spirit, the *Neshamah* breath like group linked soul, and the ones directly linked with G-d being Chaya and the ultimate Yechida. 81, 278-281. Remarkably, the first of these three soul terms are found in seven unrelated language families in North American Indians. 305, 306 and so parallel Kabbalah. Importantly, these concepts are different in TDVP in that whereas levels of development are recognized, the term 'soul' is not used. It does not need to be because the various dimensional levels make it non-dualistic, and a unified essence.
- Infinity is also very important in Jainism, which like Kabbalah implies the concept of 'infinity of infinities', and that is extensively discussed in Jainism. Infinity is used in a different context with various levels: Jainists talk of infinity squared or to other multiple powers. In Jainism, the soul has four infinities: A pure soul is

defined as an entity, which has infinite knowledge, infinite intuition, infinite bliss and infinite power. In Jainism there are 14 levels (*Gunsthanas*) of elevated consciousness from the worst to the best in Jainism. These are called '*Gun*' meaning characteristic and '*sthan*' meaning place. Therefore in Jainism, the infinite is as relevant, but that infinite is certainly not linked up with anything theistic. ²⁹²

- The link with TDVP involves the recognition of infinite realities linked with the finite 3S-1t and both Kabbalists and Jainists utilize spiritual development that is associated with the physical 3S-1t human experience, but also linked with the mystical infinite. In TDVP, the various further dimensional levels allow for other finite-infinite unions but in one essence.
- A different, but important approach has been to recognize the various divine attributes: In Christianity, they are the, modeled somewhat from the Augustinian concepts of omniscience, omnificence, omnibenevolence, omnipotence, and omnipresence. ³⁰⁷ TDVP while recognizing 'oneness', doesn't express opinions on these.

EXHIBIT 5: LAWS OF NATURE. 308

The laws of nature refer to the model of laws universally applicable to all of reality constituting finite and infinite existence. These universal laws can understand all of nature. The Neppe-Close TDVP model scientifically implies the unification of these finite and infinite laws: Even events or objects may appear "supernatural" or "miraculous" *in our restricted 3S-1t reality experience*, but still conform to natural laws at higher dimensional and infinite levels—there are no limitations to the infinite. This does not diminish a deity and does not diminish the model of TDVP. There are rules and laws of science which are not modifiable, otherwise they become not a science. And yet, often those same awarenesses exist theologically as in Kabbalah.

- Given that the cosmological data on gimmel and TRUE works just as it does in the quantal disciplines, and that macroscopically consciousness appears relevant, the existence of one rule of nature for everything is a major advance. We can unify the laws of the cosmos as the same laws of nature. All is one. ^{7, 18, 46, 81, 124, 199, 269, 309}
- The supernatural and miracles do not fit in TDVP. ^{46, 81, 124, 199, 268, 307} The Laws of nature apply for everything, from the quantum to the cosmological. This means we can unify the fundamental forces of physics: It is a natural sequence.
- However, the same 'miracles' can occur because the laws of nature are far broader than our conceptualization in 3S-1t. Everything in the broader finite embedded in the infinite becomes possible. This is a TDVP principle and linked with Kabbalah.
- When scoring the Hebrew 'gematria' (numbers for letters) for the laws of nature (*ha-teba*) and G-d (*Elokim*) both score 86. ³⁰⁸ This result shouldn't diminish theological perceptions of a divinity, implying G-d is all of nature.

ORGANIZING PRINCIPLES IN TDVP TRANSLATED INTO SPIRITUALITY: SECTION 11

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

Ordropy:

Ordropy refers to the existence of spatial, temporal or other meaningful patterns with *multidimensional* order, in finite and infinite subrealities, including, but not limited to, negative entropy ("negentropy") as it relates to the 3S-1t dimensional domain. A second component is Informational [I] Ordropy. Neppe and Close think ordropy is likely expressed in gimmel as they are both non-energetic but impacts mass-energy (previously "extropy"). ⁷ Entropy is, in part, an antonym, describing the physical tendency to disorder. But entropy still exists physically separate from ordropy.

With the presence of tethering and a fundamental "consciousness" as well as space and time, the likelihood of a requisite order to reality becomes a theoretical possibility and there is empirical data (e.g., life and its origins) to support that. This means that there may be another system besides the closed finite concept of physical "disorder" that we call "entropy". This is more than "negative entropy" as it is multidimensional. We call this active system "ordropy" ⁷. The discovery of gimmel became an additional profound argument in favor of such an order.

The concept of ordropy is simplistically far beyond a negative entropy and broader than that reflected in a finite multidimensional order. But to understand ordropy, we should briefly mention the history of the Austrian physicist and philosopher, Ludwig Boltzmann (1844–1906), known for his statistical mechanics, who predicted the properties of atoms but who argued for immortal existence potentially being impossible because we would all tend towards disorder, and at the end there would be no energy and the world and cosmos would all suddenly end: Dynamically ordered states are "infinitely improbable" based on Boltzmann's view of the second law of thermodynamics. ³¹⁰ However, empirically this famous hypothesis has been refuted, though physicists still accept the same premises that led to Boltzmann's false conclusion. ³¹¹ Ironically, the refuters do not recognize the infinite and therefore still accept entropy (as do almost all physicists). Instead, the refutation, we argue, lies in the assumption of a finite universe only, where entropy could, in fact, lead to a final (Kelvin type) "heat death." But if we include infinity, we have an "open universe" where dynamic order (ordropy) is eminently possible.

Ordropy is a fundamental spiritual concept and, for example, is part of Kabbalah though the terminology is different. Ordropy is far more than just negative entropy

(negentropy). It is in the domain of the infinite-dimensional. The term 'ordropy' derives not only from 'order' as in 'ord-' and the reversal of 'entropy' as in 'tropy', but the 'd' in 'ordropy' also refers to the N-dimensional element. Based on our common experience of life and order, the existence of ordropy should be obvious, overt, and real. We are all living in a physically ordered state. It is insufficient, we argue, to contend that "there must be some compensatory disorder in the physical world to compensate for that point of order." What proof exists there? Perhaps, an existence including 9 finite dimensions in an infinite, and a proof of gimmel or consciousness, would change perceptions? We use "ordropy" as a composite term to explain the state of order that may be linked with the infinite and also sentient beings in the finite. The infinite is always impacting on the finite. We do not discount entropy in the finite: it is necessary for the finite second law of thermodynamics.

Ordropy is *in addition* to entropy not instead of, and ordropy originates in the infinite and is continuously impacting the finite. The supply of gimmel in the continuous infinite is always unending (as is everything in the infinite), and provides ultimately an extra third component in the finite besides mass-energy. This 'extra component' needs to be taken into account. The presence of the gimmel component changes the ball-game as the infinite necessarily envelops the finite, and we have proposed a law of conservation of gimmel and TRUE. ¹⁸ This too needs to be applied.

Ordropy and the infinite

We have proposed that the source of multidimensional order derives from the infinite.

⁷ At the physical finite level with this ordropic reality (ordered multidimensional reality), there is an admixture with disorder (entropy). Conservation of matter and energy generally converts to an entropic process of disorder in the finite. Entropy is linear with one direction tending toward disorder: so entropy is not the opposite of Ordropy, just one of the opposite finite level components. ⁷ We maintain that the finite physics is insufficient to explain ordropy. Consequently, this strongly argues for the infinite reality.

- We further motivate a broader ordered reality that is not limited to a closed complete setting and an open, infinite setting that implies multidimensionality. Entropy is applicable in a finite closed system because the second law of thermodynamics is not compromised (but it cannot be taken to its extremes according to Boltzmann ³¹⁰—however, few others agree). However, it does not apply in infinite open reality.
- Ordropic order necessarily had to be in an open system otherwise the laws of entropy would be compromised and in turn, many of the fundamental laws of physics would be overturned. Ordropy is not only a multidimensional level, but implies order at that infinity level—infinite dimensional reality. In summary, the physics of entropy is inapplicable if you go infinite because infinity reflects an

open reality, and ordropy is far more than just negative entropy because it is all pervasive, not unidimensional order. ⁷

It is ironic that the term "extropy" was actually developed by one of the authors, Dr. Ed Close, in his book *Infinite Continuity*, and he followed up using Extropy in *Transcendental Physics* ^{138, 312} and we used it in our first edition of RBC! ⁹⁴

Ordropy and life.

- In the life sciences, the potential for life arises around the Big Bang event horizon in the C-substrate. *Physical life becomes actualized into reality when the correct genetic and anatomicophysiological markers evolve to sustain such existence.* ⁷
- While physically alive, we all experience a remarkable *order and structure to life*, a consciousness, and a separation of self from others. We are ordered beings even if tendencies towards physical disorder play a role. If we were purely entropic beings, we would die very quickly. Yet each individual knows at least, that he or she exists. Is there truly an equivalent added disorder in the rest of the closed loop cosmos to balance that order as claimed by the standard model of physics with entropy? We do not think so. There is entropy. But there's also infinite order.
- A strongly motivated alternative explanation for ordered reality in living individuals is through the concept of infinite continuous systems permeating through the closed finite discrete systems that may ostensibly produce disorder in physical reality. That demonstrates that our life and existence is ordropic.
 Ordropy implies infinite immortality for all. beings.
- The need for ordropy derives from existence in the infinite and conversely because of the limitations of explaining ordered life in the finite, ordropy implies infinity. ⁷

Conservation of gimmel and ordropy

Amongst the most important contributions of the TDVP model is the awareness of conservation not only of matter and energy but gimmel. This has staggering implications for the infinite because it implies that nothing is lost, and everything is immortal and exists forever. This is dramatically different from conventional thinking. ^{7, 313, 18} We introduced the term "Ordropy" to avoid ambiguity. Therefore, the original term "extropy" in the first edition ⁹⁴ is "ordropy" in the second. All these properties pervade the laws of nature, and make up an infinite essence. But it's just we do not know what laws of nature the infinite essence consists of.

Life

Life always exists in the Infinite <u>subreality</u>. It exists from the source of multidimensional order ("<u>Ordropy"</u>) within the infinite. But Life reflects very significant order at many levels (ordropy). An infinite potential for life manifests in the finite subreality as physical life only provided adequate biology can support that Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

physical existence. When that physiological support is no longer possible, physical life terminates as 'death'. But in TDVP, that death is never an extinction, and continues in the infinite according to conservation of gimmel, TRUE and ordropy.

In the life sciences, the potential for life arises around the Big Bang, or what we call the event horizon. Physical life becomes actualized into reality when the correct genetic and anatomicophysiological markers evolve to sustain such existence, but it requires gimmel as the vehicle of the Consciousness Substrate.

We still experience such an infinite subreality by its mirroring or even direct pixel type expression in the metafinite (the finite and the transfinite together).

It is this infinity linked up with the order that logically has to be a direct consequence of the infinite. Whereas the criticism has always been, "you don't get around that second law of thermodynamics", you do here, because you have life. The existence of life in the universe has to be acknowledged by even the most hardened reductionist. But it is unexplained by any materialist model. *Physiology and DNA do not explain why physical life comes about, just how.*

Life tracks, psi and free-will

We present a metaphorical speculation, but certainly one that, given TDVP, could reflect a broader reality: We could model our finite lives into a track in the infinite. This would reflect our "life track" for all of our finite and infinite existence. Though we would all be on our own individual life tracks, our tracks are not separated from others—we interface all the time (this is the equivalent of or may be vortical indivension in the infinite). We are part of those vast objective tracks of all sentient beings and perhaps even inanimate objects. That track is reflected in STC, ordropy and in our personal essence in the infinite.

The unification of the laws of physics: Vortical Physics, rotation and gimmel.

There have been many attempts at a unified law of physics, and finally, after a century of searching, this might provide a simple model for the unification of the laws of physics. ¹⁸ This model would solve the four fundamental forces, and explain gravitation particularly, by applying simple three-dimensional volumetric vortical rotation across 9-dimensions. The model is still incomplete at present, but it is advanced in formulation.

This groundbreaking Neppe-Close 2018 postulate, involves the idea of vortical rotations moving at light speed through nine dimensions. We can imagine a ballerina dancing at high speed with her dress swirling outward to the extreme, or covered inward close to the body: this changes angular momentum. But, alternatively, and more likely, depending on how one conceptualizes the rotations relative to the Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

framework of 3S-1t, the swirling might appear more like a tornado, with the higher dimensions being much more outward than the lower (e.g., 1-3 space dimensional domains). ¹⁸

On the outside horizon is the gimmel or the consciousness, and there is a hierarchy through to that outside because that hierarchy would imply that all the different forces of the universe are involved.

From the inside, at the axis, are the tight quarks of the protons and neutrons describing *the strong force*. ³¹⁴ We need not be concerned with gluons ^{9, 261, 262, 315} which are frequently described as explaining the glue in the strong forces: Gimmel vortices rotating through 9 dimensions are more logical and dynamic. ^{29,18 9, 261, 262} More importantly, based on our 9-D math calculations, gluons appear to be unstable: The 'gluons' would need the extra electron components as supplied by gimmel in union with electrons. ⁹

At the second level, linked at the axis of inertial rotation, the second force—the weak force has been linked with electron rotation. Again, we need not be concerned with the Higgs Boson, which supposedly provides the mass-energy for the weaker force that is linked with the electron cloud. 117, 316, 317 We can use purely the discovery of gimmel, again. 318-323

The third level of this hypothetical Neppe-Close vortical dimensional energy model refers to the electromagnetic effect. ³²⁴⁻³²⁶ ^{324, 326} This could, in one example, be linked up with the photons ³⁰⁴, and again with significant gimmel connections. ¹⁸ (A further hypothesis of dubious relevance here, would possibly be the finite being embedded in the infinite, involving gimmel commonality.) Interestingly, neutrinos and other unstable subatomic particles are involved ³²⁴ and we've shown this to be relevant in the Hydrogen-1, Deuterium (H-2) interface. ^{18, 85-94}The fourth force is the gravitational force ^{327, 328} ³²⁷⁻³³⁰. We postulate this becomes weaker as one goes higher and higher in terms of those vortical dimensional rotations (from 1 to 3 to 6 to 9 and then onto the transfinite). This would be 'located in the spinning vortical energy' on that periphery or horizon of the gimmel and is speculative. ¹⁸ We speculate, radically, that what we have been calling 'gravitational attraction' is gimmel in union with mass and energy.

This model appears to unify the idea of the various laws of force thought to have been four different laws. This new paradigm may well be groundbreaking, applying TDVP, the CoDD with TRUE and gimmel, and using dynamic near-speed of light vortical rotations, energy, and gimmel in a 9 plus dimensional model (there is no reason why the still quantized transfinite should not be involved) and likely the continuous infinite.

Organizing effects: TRUE unit measures

The TRUE unit measures, which are very, very specific for each subatomic particle, imply a certain organization. Conservation of gimmel or conservation of TRUE units is extremely important, just like conservation of mass and energy. But that conservation of mass and energy is purely in a finite reality, producing entropic processes—meaning that there is a tendency towards disorder. In this instance, we're dealing with ordropy; and the ordropy is this tendency towards order. We postulate that this is at the infinite level, and therefore there is conservation of mass, energy and gimmel—and that conservation is a "conservation of order". It also strongly suggests that there is survival after physical death. We have proved that gimmel, like mass and energy, is conserved in any process. ^{18, 85-94}. That, in turn, strongly suggests that consciousness survives physical death. ^{251-254, 256, 260} Is gimmel reflecting meaningful consciousness/information content? What else could it be?

Organizing Principles

We posit that the organizing principles reflect the same concept as ordropy. Such order might originate within the fabric of the infinite. Putting equations of consciousness in physics is something important ⁸, and we have applied this with the calculations in the CoDD of gimmel and TRUE. But it is in the context of infinity, and of the levels of a possible higher consciousness, higher awareness in terms of mankind, and survival after death that ordropy may be most applicable.

Revisiting spirituality and science: Godliness and higher powers

The concept of order in the infinite that persists forever is a remarkable one. It is not difficult to conceptualize because an infinite continuity exists forever, without end in space, and as an unending repository of information. This means nothing ever ends. Some scientists could argue that this infinite is just something mathematically neutral. But given that very few even acknowledge such an eternal, forever, unending continuity, that debate would be poor. We must look at the logic of our world, at the pure order, at even at the mathematical formulae that are extraordinarily precise so that our world and universe can exist and can continuity to exist. But, to us, this is far more than just a G-d that is a deistic clockmaker and does not intervene ²⁰⁹. The presence of impact in our Calculus of Distinctions 82,84, the data on prayer actually working 160, 175, 178, 189, the inspiration to develop creative ideas 67, 331-333, the choice of good and evil 334, 335, and of a limited freedom of will 336, plus the awareness of a higher consciousness 7, 8, 39, 147, 148, takes us far beyond the inactive clockmaker 209 to a physical world of dynamic beauty, always interchanging mathematically with an infinite: Any Theory of Everything could not work—would be incomplete—without the infinite continuity. These factors provide an awareness that we are not just physical beings who are born and die ^{139, 141, 253, 260}, but that we have an immortal spark of Godliness—or better, G-dliness. Spirituality is part of science!

FREE-WILL: LIMITED FREEDOM OF WILL AND GOOD AND EVIL: SECTION 12

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

Does free-will exist? ³³⁷ The approach to free-will must be scientific: That requires not just using Popperian falsifiability, because we must also apply LFAF (Lower dimensional feasibility, absent falsification), including what is feasible but not falsified. ^{5, 40, 73} And given the cogent arguments demonstrating the Neppe-Close Triadic Dimensional Vortical Paradigm ^{7, 39, 338} (TDVP), it must also apply to TDVP.

From the scientific data above and applying our further spiritual awarenesses, we have eliminated two major views that reject free-will: And we suggest a third.

- **1. OUT:** The current prevailing materialist, reductionist philosophy argues that free-will cannot exist: We are simply machines, who have been born with specific genes, have had no choice with our environment, and we interact with random events. We are conditioned to respond in specific ways, and then we ultimately die.
- **2. OUT:** The second view argues that if there is evidence for precognition and presentiment, then that would exclude free-will. The converse applies: If free-will exists, then precognition does not. That means we cannot have both free- will and precognition. However, because there's profound scientific data ^{148, 226, 241} supporting precognition and presentiment, ³³⁹ it's likely we don't have free-will.
- **3. WORKABLE:** Instead, we argue from a third perspective, for the legitimate existence of both free-will and precognition. Precognition is scientifically demonstrated. ^{148, 226, 241} But applying basic principles derived from the Neppe-Close TDVP (Triadic Dimensional Distinction Vortical Paradigm) everything obeys the laws of nature but they're larger laws than 3S-1t: 3-dimensional time allows the option of freedom of choice by individuals and at multiple different levels of groups ('individual-units'): an extensive Systems Theory approach implies that everything has some limited free-will with what can be touched. The leaves and tree branches extend outwards, but cannot control the whole forest. Only the infinite could do that implying an active omnipresence contributing to our world: This involves the roles of meaning, guidance and consciousness, and of 'relative' influence, impacts, and 'relative free-will', cause and effect, and gimmel. ^{336, 340} The guidance, consciousness and influence components, we learn from the spiritual.

We now apply a model that works, compatible with Triadic Dimensional Vortical Paradigm and with spirituality. TDVP allows for limited free-will ³⁴¹⁻³⁴³: It is relative to our immediate experience of what we call 'life-tracks'. We can metaphorically understand free-will by applying the TDVP 'life-track concept', where we can visualize leaves, branches, trees and Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). *IQNJ. 10 2: 7-108. 2018. V8.414 18091411v180619* © *Vernon M Neppe and ECAO.*

forests, and in which most of us are impacting and influencing only our immediate contiguous branches. However, even subatomic particles would have some degree of non-random free-will, though it may appear random in the 3S-1t domain.

- 'Free-will' might exist but only if we impact and influence from the infinite—that could imply G-d: The implications of that broadest forest of infinity would be enormous, as a deity could theistically impact directly on us all.
- Restricted free-will (in individuals or groups at 3S-1t) and unrestricted free-will (as in infinity, for example G-d) requires multidimensional time ³⁴⁴. This is fundamental to TDVP ^{7, 151, 345-349}. This is a convenient, though unproven, but eminently feasible, secondary TDVP proposal: we apply the theoretical model of 3-dimensional Time allowing us to change directions. 3-D Time is not absolutely necessary for free-will, but is a convenient conceptualization.
- Appreciating we're existing in a 9-dimensional (9-D) finite quantized reality, embedded in a continuous infinite fabric, applying LFAF, free-will and precognition together become feasible. However, to apply the free-will model, we would need to go beyond 3S-1t. The existence of the key free-will and precognition components are beyond our restricted physical 3S-1t domain. 344
- But this model works even knowing that precognition is a fact,—proven at the 1-in-a-billion level ^{164, 226} (at the 6-sigma level). ^{139, 141, 253, 260,=}.

But Free-will also can likely work applying another, likely 3rd dimension of Time. ³⁴⁷

- In the first linear Time dimension, we have clock time and past, present and future.
- In the second planar Time dimension, we can chart or two-dimensionally graph our dreams and those of other groups—each is different in another time estimation.
- And, in that third volumetric Time dimension we can make choices: We shift the planar arrow of time in another direction: But that third Time Dimensions allows for our restricted free-will. ^{151, 347, 348, 350}—restricted because it's not the whole forest (only the infinite has that) but the tree branches.
- However, additionally, Time is always contained in Consciousness, so we're registering that experience in our extended consciousness (as per TDVP).

Neppe Law of Cause and Effect

As an aside, Vernon Neppe's 'Neppe Law of Cause and Effect' (NLCE) ³⁵¹ ³⁵² appears to be a formidable model that can be understood via TDVP. Neppe developed this at age 12 in response to a puzzling series of events: It has remained unchanged since then. In NLCE, we recognize that events change in quantized moments in time; the cause produces an *actualized* effect in other different dimensional time domains. Because we can modify our choices to a degree in 3S-1t, that effect can be changed. Precognitions appear altered *relative to our 3S-1t experience framework* and therefore

fully compatible with TDVP. NLCE is contrasted with *John Dunne's hypothesis* pp of 'time seriality' ³⁵³. Dunne recognized precognitive phenomena as already serially happening; but he didn't possibly conceptualize 3-Time dimensions, nor free-will. ³⁵³

Good and Evil

Free-will is closely connected with freedom of choice. 'Good' and 'Evil' implies opposite poles but neglected areas of moral behavior. ³⁵⁴ This introduces another linkage with Spirituality and Science because a logical consequence of Free-will is choices of behavior and thought. Those choices are linked with Multidimensional Time ^{151, 347, 348} and Consciousness ^{8, 147, 148} as in the TDVP model ^{39, 298, 313}. Good and evil may be individual or involve groups—linking with the 'individual-unit' social *systems concept in TDVP* ^{7, 134}— ethicospirituobiopsychofamiliosocioethnicocultural —systems approach. ³⁵⁵ This systems approach may be useful in more broadly conceptualizing good and evil. ³⁵⁴

There is a polarity for behaviors and 'good' sometimes requires action, including opposing evil acts. Neppe has referred to '*Evil Obedience*' ³⁵⁶⁻³⁵⁸ when individuals and groups become inactive, not doing anything, and passively complying in the face even of atrocities. He gives the classic example of the Nazis, where very few stood up for what was spiritually appropriate—for active righteous behavior. ³⁵⁴

But not all evil is the same. When behaviors are individual, Neppe differentiates mental illness causing evil behavior as relatively uncommon: This refers to those unfortunate patients with psychiatric disorders diagnosed as 'DSM Axis-1' psychopathologies. ^{359, 360 354} These patients only rarely reflect evil behaviors against others (e.g., in psychoses, paranoia, depression, and organic brain disturbances), though they are at greater risk for suicide. But, Neppe 'guesstimates' these mentally ill individuals constitute only about 5% of violent perpetrators. ^{354, 361} This is contrasted with the whole population, not just those presenting as mentally ill. This 'evil' group includes the psychopath, sociopath and antisocial personalities. Consequently, Neppe proposes a new independent 'DSM Axis 6 of Good and Evil'. ³⁵⁴ This Axis 6 can incorporate evil individuals who have never presented as mentally ill.

Theological issues and spiritual growth, are critical here, as well as the science understanding these behaviors. Neppe emphasizes the pervading, but possible social irresponsibility of society providing fame for assassins ^{qq}, and how relative to the times 'evil' has become based on political correctness. ³⁵⁴ There is a difference

^{pp} NLCE contrasts with John Dunne's Experiment with Time which has significant logical, theoretical, and empirical problems, including serial and parallel times and non-recognition of dimensional differences

^{qq} Neppe strongly suggests that assassins and individuals seeking vicarious notoriety should not be named or publicly identified. Instead they should be anonymous like the number 46067E.

between 'Evil Obedience' implying compliance with evil, and inaction versus active opposition by Good people against Evil. 354

Why do bad things happen to 'good people'?

A related issue is why good people are sometimes punished. What kind of justice is this? This is an age-old question which many theologians and philosophers argue has no answer. Some feel they cannot recognize a deity as a consequence—they become atheists. Perhaps TDVP can provide an answer? We live in a spiritual essence with 9D finite embedded in an infinite continuity. But history only perceives and relates what is '3S-1T'. Here the 1T is the present and the past. Terrible atrocities may happen in 3S-1t and yet the remaining dimensional domains including Consciousness and multidimensional Time might produce entirely different outcomes.

Perhaps there is an answer. We do not just conceive of our experience in 3S-1t. That is only part of the jigsaw puzzle as in the TDVP model. We must look beyond to what else is happening in that forest of existence. Could it be that the patterns of terrible events, may be prevented or altered in the Free-will of Multidimensional Time and Consciousness? Could it be that we could collectively have applied our restricted free-will and changed the outcomes? Could it be that if we could experience the different higher dimensions we're existing in that the whole picture of destruction might be so different? Could we be like colonies of ants being drowned, and yet that act could help our overall stability of our universe, cosmos and / or consciousness? If we don't see all, perhaps we should not condemn as easily. The higher purpose might be missing. 354

Perspective

Applying the TDVP model, complete free-will may only be available at the infinite level, and some would argue that implies only a deity. However, Mankind should have restricted free-will, applying the metaphor of a tree and branches. And that restricted free-will mean that man can impact and influence and be influenced including being involved with healing ^{177, 181, 362-368} and prayer. The metaphorical levels of that tree, roots, and branches in the forest, may impact others ⁸⁴ and be impacted. And those leaves and trees may be used for good and for bad. ³⁵⁴

Given our restricted, still very much active, free-will in the 3S-1t, we again ask the major question: If only deism, the 'Watchmaker' automatically running the clock ²⁰⁹, then *What is Man's purpose? What is our purpose?* Mankind may not be able to understand the reasons and *meaning* for our existence. The "why" appears to be lacking and that is philosophically unsatisfactory in just 3S-1t. But recognizing TDVP's far broader 9-dimensional reality embedded in the infinite allows for hope: There is far more than just space-time, there is meaningful consciousness.

PERSPECTIVE: DIMENSIONAL BIOPSYCHOPHYSICS: APPROACHING DIMENSIONS, INFINITY, MEANING, AND UNDERSTANDING SPIRITUALITY AND THE LAWS OF NATURE: SECTION 13

Vernon M. Neppe MD, PhD, FRSSAf and Edward R. Close PhD

Dimensional Biopsychophysics

In Triadic Dimensional Vortical Paradigm (TDVP) ³⁹ the broadening of science necessarily includes going to higher dimensions, consciousness, our biological existence and physics. Neppe and Close pioneered this encompassing specialty of Dimensional Biopsychophysics ^{369, 370} This discipline incorporates Consciousness Research, psi ³² and almost certainly spirituality.

Dimensions and Extent

Dimensions have often been misused as a term. In TDVP, we've very carefully operationalized what 'dimension' means. 120, 370, 371 In technical nomenclature, "a dimension is a non-congruent, non-parallel extensions, measurable in terms of variables of extent (CoD) such as Space, Time and (dimensional) Consciousness. Operationally, in the Euclidean framework, for convenience, dimensions are defined as orthogonal to each other and characterized in degrees of freedom. A continuous distinction that can be measured in units of extent. These interact together forming different domains with specific properties." Translated into English: We can measure dimensions. They have extent and they go on much further than just the length, breadth and height that we experience in our physical reality, and we can conceptualize far more than just the one dimension of time limited to past, present and future. Consciousness and these higher time and space dimensions cannot be accurately measured in integers (0, 1, 2, 3, 4 etc.) but instead are measured first in imaginary numbers and then complex numbers, progressing into being defined ordinally (in terms like none, slight, moderate, marked, profound) relating to the position in a series but where differences may vary e.g. between slight and moderate may not be the same as moderate to marked. Ordinals are also applicable in the transfinite and the infinite.

Therefore, dimensions involve measurable extent of some kind, such as length, breadth, depth. Dimensions reflect the extent measures 'intervally' of space (physically interval in integrals one two three), and time (only one volumetric moment the present is experienced in 3S-1t) in our 3S-1t reality. They then become ordinal (slight, moderate, marked, for example) once one goes beyond 3S-1t. And the always ordinal dimensions of consciousness envelop the space and the time—they're embedded or implanted or contained within consciousness.

Containers and Content

There can be no extent without content. ^{7, 120, 134, 370, 371} Those dimensional domains (collections of substrates like our physical 3S-1t) are not empty. ^{372, 373} They contain mass, energy, and gimmel with consciousness. Albert Einstein emphasized this largely unrecognized fact; space – and because it's space/time – space/time never is 'empty'. The bottom line is, if you have space/time, and consciousness, you also have a content. And that content is never empty. And so when one talks about electrons, one is not talking about an empty field in between; one is talking about a cloud, the electron cloud.

Extra dimensions

So, what lies in the content surrounding the neurons and synapses of our brain? And why had there not been a real theory of everything prior to TDVP? It's because mainstream physicists have refused to look outside the box of materialism. And their education steadfastly avoids higher dimensional domains, consciousness and infinity. And we know from Minkowski, Lorentz and Einstein 55, 56 and others following that space and time are not the same substrate; they're different.

Extra dimensions beyond the physical restricted 3S-1t we *experience* are necessary. Applying TDVP, we hypothesized, based on number-theoretical structure and empirical data, that it was likely that there were exactly 9 quantized spinning finite dimensions 109, 113-116 We then demonstrated the existence of nine dimensional domains mathematically and replicated this finding. 7, 134

Mathematics and Dimensions of Space, Time and Consciousness

Examining the natural structure of pure mathematics, it further became clear that the nature of dimensional domains must change after each series of three dimensions. The first 3 dimensions define the domain of space—including finite physical objects but going well beyond that (ordinally). The second 3 dimensions define Time in the domain of space-time. They include all finite events and, in our opinion, almost certainly multidimensional time. And the third three describes Consciousness incorporating the domain of space, time and consciousness, and includes individual consciousness.

Revisiting Gimmel and 9-D

Gimmel as related to consciousness is a different kind of agent or substrate, the enveloping organizing principle, hovering over space and time, and the substrate out of which everything comes into being 8, 9, 14, 18. Consciousness hovering over is the fundamental component of reality we experience directly, yet bizarrely we take it for granted. 4, 147, 148 Consciousness is always associated with, the brain, autonomic and peripheral nervous systems but ignored. Consciousness precedes and shapes the Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

entire reality we experience; like the air, it's not visible to us. We are so close to it we do not see it as something real.

Teleologically, we needed to incorporate extra time and consciousness dimensions as well and these should be recognized volumetric. Hence applying Occam's razor ³⁷⁴-, the minimum is 9 and again this confirms our data

All nine finite dimensions are encompassed in the still discrete transfinite substrate. But all of these dimensions are encompassed by a primary form of consciousness -- and that's what's traditionally then called the Infinite continuity or the *Ein Sof* and for theologians, G-d.

Interestingly in Kabbalah, there are 9 *indisputable* emanations —sefirot, in effect all connected, and yet reflecting all qualities of cognition affect volition and yet have a higher level there is a tenth plus level like the quantized transfinite in TDVP.^{rr ss}

Revisiting Consciousness

The Neppe-Close TDVP paradigm incorporates this space-time-consciousness into moving and rotating energy vortices: That changes everything: It opens the door to a new reality that is rich and full of promise and opportunity. A new paradigm shift into a consciousness-based infinite reality hovering over, where at the infinite level energy and potentially mass (but not there likely just potential in the finite) incorporating added dimensions and infinity, as an essential essence.

Infinity refers to a non-quantized, unbroken continuity that is forever extended in unbounded space, eternal time and an all-pervasive consciousness repository. Our quantized dimensions (finite and transfinite) are all intimately, necessarily and inseparably "embedded" (directly contained)— metaphorically like nested Russian dolls, but integrated, more than just a connection —in this infinite continuity.

Immediacy and Instantaneity

Our overtly expressed familiar moment-to-moment finite physical reality <u>experience</u> as living sentient beings occurs in three spatial dimensions in a moment in time (3S-1t). However, much of even our finite existence is hidden (covert) and we're not aware through our physical senses of the influence of nine rotating dimensions ('9D spin') embedded in an infinite existence 9D. But what happens when we move from 3S-1t to higher dimensions? Surely the rules are different because they're relative to different dimensional domains.

^{IT} The sefirot emanations, are listed as the 10 attributes/emanations in Kabbalah, through which Ein Sof (The Infinite) reveals himself and continuously creates both the physical realm and the chain of higher metaphysical realms. The term is alternatively transliterated into English as *Sefirot/Sefirot*, singular Sephirah/Sephirah.

ss It may be surprising to learn of nine definitive and not ten sephirot. The tenth is always listed but variably: Da'at—knowledge or knowing is the common tenth. Chabad Sephirah; but *Keter*—crown is the usual description, the higher conscious intermediary between God and the other conscious sefirot. There are four other levels of emanation above this, and, at times, *Malkhut* (kingship) not portrayed in a triad of qualities is also regarded differently.

One example of this changed rule which might reflect a great conceptual jump if TRUE is the Neppe and Close dimensional concept of "immediacy". 377, 378 From the framework of 3S-1t, events in the higher (>3S-1t) dimensions happen immediately in time, space and consciousness. This allows us to understand such phenomena as entanglement, possibly psi where space and time appear non-local relative to 3S-1t. 38, 164, 228, 377, 379, 380, and tethering across and moving to higher dimensions from 3S-1t. We have used the metaphor of the hand and arm to the shoulder, except that this metaphor is at a higher dimensional level embedded in an infinite substrate and hence this has no delay in time. ^{377, 378}Immediacy can also be regarded similarly to Herbert's "instantaneous connectivity" of objects, substances or events ³⁸¹ It is not even like traveling at light speed—it is not a wave: communication is instantaneous. And each might vary: though they may not be at the same dimensional levels: Effectively, there is "immediate" relative non-local communication. With psi 38, 164, 228, 377, 379, 380 events may not be occurring at the same dimensional levels maybe just beyond 3S-1t, or a higher dimensional domain, or at infinity in another example.

Perhaps we can use this immediacy in the future in space travel or space-time consciousness travel? And perhaps our consciousness enveloping space-time or maybe an awareness of gimmel would be the vehicle?

Some personal so-called *'miracles'* might speculatively occur at that infinite level but would still obeying that same extensive (G-dly?) laws of nature, both finite or infinite. ^{124, 199} Entanglement ^{26, 28, 29, 382} and tethering ⁷ may be examples of this phenomenon that manifests as relative non-locality ^{20, 21, 378, 383}.

Our parallel might be the speed of light. We do not know whether there might not be only one 'immediacy' point where even light speed is not relevant. Our model is 'explicate' in 3s-1t, but 'implicate' when shifting across from 3S-1t to higher dimensions. But there could be multiple stages of immediacy from Space dimensions to higher Time dimensions and then to Consciousness dimensions, for example. Certainly, at the infinite, there should be an instantaneity compared with the 9-dimensional domains. We could postulate that here might be multiple stages of immediacy relative to one's framework in the finite, but most likely, it would be another kind of light, an emanation from the infinite (Kabbalistically, called the *Or Ein Sof* — 'the light of infinity—the without an end'), that would facilitate a relative immediacy in the infinite because there is effectively an eternity of every time. Then a reverse of immediacy could occur as the photon in infinity is infinite in time, and then the photon conceptualized from the framework of 3S-1t would be traveling at the speed of light (about 300,000 kilometers per second). 142, 303, 304

Infinity

Applying TDVP, the infinite continuity contains the discrete finite. They are never separate and, in that context, not dualistic but single aspects expressed differently. Our consciousness in the infinite would be not only the infinite repository of consciousness, which we call 'Da'at'. Or it might be the knowing component, or the understanding of everything. With infinity, we could speculate if this is a hierarchy of pure consciousness. This would refer possibly to an infinite repository of knowing, understanding and wisdom. It might, for example, incorporate ourselves after death for example, and perhaps this could mirror or many different finite dimensional domains, and similarly the infinite would mirror the same physical essence in physical 3S-1t in higher dimensional domains. This contrasts with consciousness in 3S-1t which we have conceptualized as barely a sliver.

Or could it be that the consciousness that at infinite level has embedded within it the Space, an unextended, never-ending component. And this eternal consciousness would incorporate the Time too, which again is never-ending, eternal, and extending forever and yet being the same time at the beginning or at the end, because this is infinite, and so we have a Kabbalic Ein Sof ("without end") and an Ein Techillah ("without beginning"). 81, 277-281 We could conceptualize (speculatively) that there might be no mass, per se, in the infinite but the photon or other equivalents would be an infinite ordropic source. The mass would be entirely 'converted' to energy, but maybe it would take a different form.

The Big Bang or equivalent finite event horizon ^{384, 385} would just be the time our gimmel was then linked with mass and energy. Gimmel would continue eternally. Yes, it provides stability for stable particles, but it antedates and post-dates such particles.

Infinity of Infinities

The pre-eminent mathematician of his time, Georg Cantor (1845-1918) conceptualized different levels of the continuous infinite. ²⁷¹ This has sometimes sounded paradoxical – because many, even now, many still perceive just one kind of infinity: If it's continuous, how can you separate it? But Cantor realized that there are countable infinities, and infinities within infinities, and it may be that these different infinities influence us even in the finite physical 3S-1t. They're indirectly experienced, but we don't directly experience them. They would always be at equivalent or parallel different dimensional domain levels in the finite and transfinite. They are embedded in the infinite almost like mirrors that are mirroring our finite experience into the equivalent of that infinite continuity or vice versa because this would speculatively be a bidirectional process. And yet the infinite is also embedded in the trans-finite, so that is also paralleled maybe reflecting the highest level of the Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional 75 infinity of infinities.

Maybe, the conceptualization of Infinity of the Infinities would be to unique each individual or individual-unit or system at their own perceived dimensional levels. Moreover, this infinity of infinities might better allow us to understand how each component of our finite reality may be mirrored in the infinite: It may be that at the finite 3S-1t is embedded in a particular part of that infinity of infinities, and that would be different from, for example, dimensions 6 to 8, which might reflect something else, like some aspects of altered states of consciousness or out of body experiences. We, therefore, postulate that the presence of the various levels of the infinity of infinities allows us to understand how each component of our finite reality may be mirrored in the infinite.

Transfinite

Cantor ²⁷¹ also conceptualized not only the *continuous* 'infinite continuity', but a different discrete 'countable infinity'—the transfinite. The transfinite is countable conceptually only in the sense of applying integers to the transfinite. However, it is impossible to count as the counting would go on forever. Even though it's called the 'countable infinity' because it is discrete and quantized, it is really so large and goes on forever, so despite being theoretically countable, but in practice, uncountable.

In our 9-dimensions we may experience this discrete transfinite or our mirroring continuous infinity, paralleling our experience. This is another heretofore mystical concept that can be based at least in part, in part on TDVP speculations. The finite is contained in the infinite, with each dimensional domain (collection of dimensions together, conveying volume) relative to each its own level.

The transfinite is an area of debate because some would perceive it as an intermediate area between the finite discrete and the infinite continuous. We have speculated that it has at least three transfinite dimensions – they are volumetric like everything else discrete, and therefore, we cannot adequately analyze it in terms of linearity. But this does not preclude the discrete nature of the trans-finite reality. And it is an elevation above the 9 dimensions – we've called it the 10th+ dimension but then it would be the 10th to 12th plus dimensions!

However, it does not mean to say that the infinite has to go through the transfinite; it doesn't. The infinite has everything else embedded in it. And so, if one is dealing with 3S-1t, there is an infinite component, where one could look at it almost as an essence that is paralleled or mirrored with that finite 3S-1t discrete – paralleled with whatever dimensions are involved in survival or in the altered states of consciousness. But, that linkage has nothing to do with the transfinite. The 'transfinite' functions might be a hierarchical bridge between the finite and the Neppe, VM; Close ER. Integrating Spirituality into Science: Applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP). IONJ. 10 2: 7-108. 2018. V8.414 18091411v180619 © Vernon M Neppe and ECAO.

infinite, a medium of mutual 'embedding at the highest level possibly. Its function is mathematical but not necessarily empirical.

"Reality Begins with Consciousness" revisited

We used the title 'Reality Begins with Consciousness' in our book, because, as indicated, it had to imply a beginning, a fabric for reality and a consciousness. Moreover, that gimmel is likely to be that consciousness or its agent, and that should have preceded the factors in the origin event – for example, the Big Bang in the finite. It had to precede these because how else could these subatomic particles be linked unless there was already a union of gimmel? Therefore, gimmel is a very spiritual phenomenon, because the implication would be that the laws of nature are unified by its union.

Survival and Immortality

If one is dealing with a 9-dimensional essence, it might theoretically be that the survival after bodily death is expressed at the finite level in other dimensional domains, like domain 7-9, but they might vary depending on the level of spiritual development at that survival level. That finite dimensional domain survival would also be involved with the infinite. Survival is implied by ordropy.

Survival after death implies a certain kind of immortality, but we could debate the exact details. To this extent Dr. Larry Dossey, Chief Editor of Explore and extensive author, and someone who has been profoundly involved with healing ^{362, 363, 386-394}, and developed the concept of non-locality ^{95, 368, 395-397}, has recognized this is an absolutely profound implication of TDVP. ³⁹⁸ He writes:

"This is an enormous contribution whose significance may surpass, even the profound implications of TDVP for cosmology and physics, in general. ... Neppe and Close have reversed the dismal conclusions of materialistic science toward consciousness, and have made the concept of immortality and the survival of bodily death scientifically respectable. ... The main contribution of Neppe and Close has been made, the deed is done. This may make all the difference in humanity's psychospiritual equipoise. ... It is difficult to imagine a greater contribution."

EPILOGUE: A SUMMARY PERSPECTIVE ON UNIFYING SCIENCE AND SPIRITUALITY: SECTION 14.

We've been on a tour of science and spirituality, two disciplines previously regarded as being their own magisteria ¹, and never meeting.

But based on the data we've presented, we now have a remarkable situation where not only do science and spirituality meet, both theoretically and empirically, but they can contribute to each other, and possibly both are required to be present together to gain a more adequate perspective of our existence, and the nature of reality.

The common element is the scientific unifying metaparadigm of the Neppe-Close TDVP (Triadic Dimensional Vortical Paradigm). 105, 253, 398-401 This includes:

- Recognition of extra dimensions beyond 3S-1t;
- Understanding that infinity envelops all of the quantized finite, but we can only experience tiny portions of reality.
- Consciousness including spirituality being fundamental.
- Recognizing our limited concepts in conventional science and redefining science more broadly to include feasibility. Science needs to be expanded to include what is feasible, but not falsified. We emphasize that it is an absolute necessity to apply LFAF (Lower dimensional feasibility, absent falsification) ^{5, 40, 73}, not just Popperian falsifiability ^{2, 3, 24}. LFAF is *critical for expanding science to include the spiritual*.

Let's amplify these key points:

- Applying LFAF, we need to get rid of the prejudice of many mainstream scientists in labeling certain legitimate disciplines as 'pseudoscience' 77,78 when they genuinely qualify to be real sciences.
- It is wonderful that mainstream scientists are prepared to recognize disciplines such as cosmology 402, 403 and evolution (though not with any kind of consciousness in it. 244, 402) as 'sciences' even though these are based on feasibility and almost nothing can be falsified. It is inspiring because it provides examples showing that feasibility in LFAF works.
- On the other hand, it is inappropriate and prejudicial to reject disciplines that have demonstrable feasibility and sometimes falsifiability, such as Consciousness research and Dimensionality as pseudosciences: That demeans legitimate science.
- Perhaps the most remarkable rejection is in parapsychology. In that discipline, the methodology is so careful it should be a model for all of the sciences ⁴³. Moreover, parapsychological phenomena is the only scientific discipline to have achieved six sigma data: This means greater than one in a billion against chance in 9 different

- subdisciplines, ¹⁶⁴ a far higher level of statistical proof than any other discipline.
- Moreover, scientific method must recognize that sometimes there are limitations of falsifiability in some areas, like double-blind studies in pharmacology 404-406 and prescriptions based on feasibility in Medicine 406-412. Similarly, the social sciences depend largely on feasibility 5, 22, 40, 129, 130 and certain areas of forensic science (like psychiatry) are almost entirely feasibility and logic based 22
- On the other hand, the only truly falsifiable science is mathematics. ^{5, 22, 40, 129, 130}. But, ironically, the area of mathematics applying higher dimensions often requires lesser levels certainty, ^{84, 112, 200, 413} because ordinal applications may be accepted as satisfactory (as in Cantor's work with the transfinite). ²⁷¹ Also, the CoDD further eliminates some of this uncertainty. Even more so, in infinity studies, feasibility and filling in of jigsaw puzzle pieces. ^{84, 112, 200, 413}
- So there are disciplines that are recognized as sciences even though they require mainly feasible logic; others are regarded prejudicially as pseudosciences despite now fulfilling LFAF and sometimes even falsifiability (as in the overwhelming six-sigma—one in a billion against chance—in psi). ⁷
- But spirituality is so demeaned by scientific materialism that it is regarded as not even a pseudoscience. If scientists even discuss the mystical, the spiritual or the theological, they are literally rejected as non-scientists and even as ignorant fools. This has to change. *Spirituality is a legitimate scientific endeavor*.
- The 'spiritual' has not been recognized because scientists need to apply the concepts of multidimensionality, consciousness, infinity, scientific feasibility, and the transcendent in order to study it.
- We need to be aware of the unification of all reality. This can be done by applying the Neppe-Close model of Triadic Dimensional Vortical Paradigm. TDVP approaches the laws of nature based on science and non-prejudicially.

Some major significant points linked with TDVP are highlighted:

- Consciousness and that part of it, the spiritual, fundamentally involves impact and influence. One time-honored component of being able to influence is the intent of prayer. Intent is fundamental in our Calculus of Distinctions. 82-84, 414, 415
 - Gimmel ^{82-84, 414, 415} has been a remarkable, and ostensibly real mystical discovery in TDVP. ^{8, 13, 15-17, 92, 99, 155, 205} It allows necessary stability in the universe, can provide an interface of the infinite in the finite, and can explain how consciousness was present before the Big Bang—at the start of finite creation. Gimmel is the extra component besides mass and energy and key in TRUE unit studies, which are part of TDVP. The consistency of these results throughout the universe links up with an ordered cosmos, perhaps a universe with meaningful mathematical consistency.
- Unified Monism is a unique TDVP scientifically derived mind-body philosophical

model involves unification of everything and implies major spiritual implications, yet UM works even in our physical reality: The infinite is enveloped in the finite, and we are all unified as one essence spiritually, philosophically and scientifically. 8, 13, 15-17, 92, 99, 155, 205

- Kabbalah ²⁷⁸⁻²⁸¹ to a strong degree, and Jainism ²⁹² in part, and possibly other transcendental traditions, at least in part, exemplify some of the remarkable links of science and spirituality: A highlight is the first three verses of Genesis. Another linkage is the paradigmatic unification of the laws of nature. ^{7, 124, 139, 199, 416}
- The neglected area of order and ordropy shows why entropy is likely very limited in the finite. ^{7, 120} The concept of conservation of gimmel means that nothing is lost in our world. ^{18, 85-94} This implies that immortality is a necessary and important aspect of reality: that immortality implies at least, survival of some level of consciousness, ^{18, 85-94}
- Limited freedom of will is highly compatible with spirituality; this recognizes precognition statistically, but allows for freedom of choice. 336, 337, 339-344, 352, 417 Moreover, order implies growth and choices of good and evil. 336, 337, 339-344, 352, 417
- The authors new discipline, dimensional biopsychophysics, illustrates the logical consistency of approaching dimensions, infinity, meaning, and understanding in spirituality and the laws of nature. 336, 337, 339-344, 352, 417

We promised to list the comments of others. Dr. David Stewart and Dr. Adrian Klein are quoted in detail as they know our work best and are eminently qualified to judge TDVP. We then list 20 more comments briefly in a footnote.

<u>Dr. Adrian Klein</u>, Israel, Dimensional Biopsychophysicist and Consciousness Researcher:

- "...The Neppe-Close contributions will change mankind's future"
- "... A seismic shift in understanding the understanding process itself!"
- "The 21st Century's revolutionary paradigm shift";
- "... unprecedented brilliance and potentially limitless scientific and philosophical outreach ... yielding a fresh and accurate understanding of various investigation fields of Nature, ..."
- "groundbreaking development perspectives for Sciences (emphatically plural!)".

These are the comments of the other expert on the TDVP model, Dr. Stewart: Dr. David Stewart, PhD, DNM, USA, Physicist, Mathematician, Theologian, Author of over 300 published articles and 17 books

• "I rank Dr. Edward R. Close and Dr. Vernon M. Neppe as peers of the major authors of modern physics and mathematics. I equate them with greats, such as Planck, Einstein, Heisenberg, Schrödinger, Bohr, Dirac, Born, Pauli, Bell, De Broglie, and their predecessors such as Newton, Maxwell, Leibnitz, Kelvin, and

many others. The Neppe-Close work, which is built upon the works of these extraordinarily brilliant and innovating pioneers, has clarified, and extended the science and mathematics that these geniuses originated over a century ago."

- "The Close-Neppe seminal work in creating TDVP constitutes one of the most profound and far-reaching discoveries and developments in the history of the sciences."
- "The authors' many years of labor will be appreciated for centuries to come."
- "When two polymaths make discoveries that are so groundbreaking they change the whole fabric of reality, it is clear that this is Nobel Prize material." "I foresee the day when they will both be awarded other honors, such as a Nobel Prize in Physics. If there were an equivalent award in Mathematics, I would nominate them for that prize, as well."
- "...laid a foundation for all future science to develop. The world of scientific understanding, in all fields, has been permanently changed... The future of all mankind is forever brighter And they aren't finished, yet."
- 21 other different specialty prominent scientists have similarly commented. tt

In summary, by applying the Neppe-Close Triadic Dimensional Vortical Paradigm (TDVP) and the recognized components identified through our TDVP findings, such as LFAF, CoDD, gimmel, higher dimensions and infinity, we can integrate the magisterium of Spirituality into Science. Science is not only eminently compatible with the spiritual: the two disciplines can contribute further to one another.

There are several brief comments by seven others in seven different disciplines. This includes possibly the world's three leading experts in their disciplines, namely Drs. Stan Krippner, Dean Radin and Larry Dossey.

[•] tt Dr. Alan Hugenot DSc, Physicist and Engineer: "When taken altogether, the entire work is worthy of several separate Nobel Prizes"

[•] A fourth quotation series is collective, from SCERS as an interdisciplinary group of <u>10</u> experts (2016-2018) including Dr. Joyce Hawkes PhD, FAAAS, biophysicist: "...any one of these [31] areas, let alone the combination would be a very substantial reason for Drs. Neppe and Close to be recipients of major prizes".

[•] Stan Krippner PhD, Humanistic Psychology: "destined to become a classic in the literature on shifting paradigms and worldviews",

[•] Dean Radin PhD, Parapsychologist: "RBC [is] in a radical multidisciplinary class by itself";

[•] Larry Dossey MD, Healing author: "...reconciliation between science and spirituality ...following TDVP"; Additionally, five other prominent scientists have significantly endorsed TDVP.

[•] Alan Bachers PhD, Psychologist: "an astonishing and prodigious accomplishment!";

[•] John Poynton PhD, Biologist: "encyclopedic ... broad exploratory paradigm for new scientific ideas";

[•] Lance Storm PhD, Editor: "a paradigm shift that ... a scientific overhaul and shift in thinking";

[•] Helmut Wautischer PhD, Philosopher: "will shape philosophical discourse ... a profound value to the future of humankind...masterful...";

[•] Frank Luger MD, Grandmaster: "astonishing that you ... combine deep scientific notions with mysticism."

[•] Paras Agrawal PhD, Physicist: "Adding consciousness... the need of the time...your efforts are extraordinary."

[•] Surendra Pokharna PhD, Theoretical Physicist: "This is a breakthrough after ... Einstein... because consciousness is also included with the new mathematics of the Calculus of Distinctions."

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