

A Theory On Combinatorics, Vis-A-Vis The Individual

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This is from several emails. Edited and with additional material.

Combinatorics

I have this preliminary theory on combinatorics, the individual, society, and the median as the (unspoken) standard of behavior:

What if the individual in say 60% of psych unit circumstances had simply invented yet another way – in a combinatorial way – to manifest thought and behavior (thought, speech, action, patterns of speech and action, behavior) that contradicted the sense of 1) someone else or 2) the median that psych unit psychiatrists have in mind? “Not again!”, the individual might say, in being committed to a psych unit. “Not again!” the complainant might say: “Sure evidence of a permanent mental illness!”

Yet all that is at play is distribution from the median (Stephen Jay Gould wrote a valuable paper titled “The Median Is Not The Message”, available on Edward Tufte’s website) – but this is natural variance as the data itself is naturally variant, in most cases, in nature – and (while it can be useful) the median is just a construct, not the actual data! AND the rules and protocols have never been addressed and clarified. AND the individual is in fact selecting from a combinatorial understanding of thought, speech, action, and patterns of thought, speech, and action! Add to that outliers of behavior (maybe a certain percentage) for an additional layer of meaning and the actual to the situations encountered.

This is excellent – and should be scrutinized.

Kevin

The intro paragraph in the following article on Wikipedia is useful in this context:

<https://en.wikipedia.org/wiki/Combinatorics>. See the bullet-point list, for example (see below). I need to know combinatorics much better, and some of Minsky's work is strongly combinatorial, I suspect. I suspect that stories of the day-knights (who always tell the truth) and the night-knights (who always tell a lie) in Smullyan’s book “To Mock A Mockingbird: An Adventure In Combinatorics And Other Logical Puzzles” is combinatorial. How many ways do the day-knights and night-knights tell their stories? I have to research further the Wikipedia page and its sub-topics.

From the Wikipedia article:

Insofar as an area can be described by the types of problems it addresses, combinatorics is involved with

- the enumeration (counting) of specified structures, sometimes referred to as arrangements or configurations in a very general sense, associated with finite systems,
- the existence of such structures that satisfy certain given criteria,
- the construction of these structures, perhaps in many ways, and
- optimization, finding the “best” structure or solution among several possibilities, be it the “largest”, “smallest” or satisfying some other optimality criterion.

And, from before: micronemes are context cues and meaning shadings, in Minsky’s book “The Society Of Mind”, that yield over a trillion combinations for just 40 bits! Minsky suspects that we have thousands or millions of these micronemes. It’s this type of thing that neuroscience should look to, along with whatever else is realistic. (The experiential and interpretational come into play: each individual, the psych professional should appreciate, has no doubt a unique set of expectations, contexts, and meanings!)

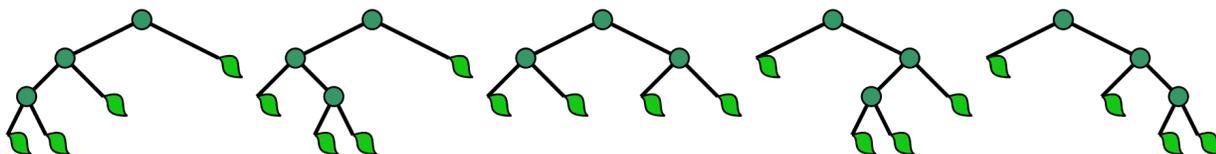
It may also be useful to note Wittgenstein’s observations from “Tractatus Logico Philosophicus” that logical space is infinite, and that it is always possible to insert a logical point into logical space (or, I might append, thought into thought space) – yielding unfolding combinatorics limited only by time, or creating that time.

And this gets into the experiential – the experiential-created and the experiential-felt.

It also gets into principle, and how one interprets, and what one sets forth as important.

One View On Combinatorics (Catalan Numbers Diagram)

Here's one example of a type of combinatorics:



5 binary trees on 3 vertices, an example of Catalan numbers.

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Now imagine the vertices and leaves are meaning-functions and points. Marvin Minsky does this in his book “The Society Of Mind”, in several different ways. If Jack puts “do something A and B” at the left-bottom vertex on the first binary tree (from left), then marches it across in different relation to other meaning-functions and points in subsequent trees, the outcomes will be different, in thinking and enaction. This entirely speaks to the psychiatrist! It should be acknowledged!

I’ve termed Minsky’s diagrams as ‘combinatorial unfolding interconnected relational action-memes’. Then I saw this diagram, and it was so concise. The entire domain lights up! As it does, with Minsky’s presentation, in his book.

Enjoy!

P.S. One could introduce the ideas ‘framework’ and ‘principle’ to this combinatorial view – and the place one finds in that. There also is the idea of time: if one places one’s mind and perceptions, and unfolding mental states, on a perceived linear arrow of reified, external time, then one might end up putting existing combinatorial branches at different places along the sequence of thought and its in-mind basis, along with experience, leading to either frustration and out-of-context location, creativity, or discovery. It’s more likely creativity and discovery if one has developed some framework and principle, and this points away in the first place from a linear arrow of reified, external time – the actual combinatorial-framework-principle, with this very world, yielding time. (See Dogen’s essay “Uji”, “Being-Time”, in “Shobogenzo”.) This might then be a very dynamic, meaningful, participant place to be.

P.P.S. I studied intensively TSOM in the early 2000s, along with a nascent Zen practice. It’s a delight to revisit and wake-state that book, with a deeper penetration of Zen – and I find that although I would take a different view on some things, the book is entirely useful. It should also present well for the Western mind; and to bring Zen to it yields a fruitful space. I hope to visit specific topics in various ways in future papers for my mvo-p thesis here. But I suggest that the psychiatrist study Minsky’s books (“The Society Of Mind”, “The Emotion Machine”, “Inventive Minds”).

Bipolar Amping Cycle

I also have a theory on how bipolar amping can occur: several idea-physiological-energy-states patterns involving here-to-there and the (mathematical sense) of normalization (normalizing x_1 to 1, then derived x_2 to 1, then derived x_3 to 1) of a previously outlier idea-energy-state: to one whereby one has really amped, and one’s internal “graph” of the data and volume and range is totally different than the graph when one started out – and then seen out of context, appears impenetrable to another person and “mentally ill” or may be seemingly intractable to the individual “as a mentally ill problem”! This involves both the mind and action, both thinking and enaction. But tracing the steps, phases, and points can illuminate. Add to this: phase-idea verification/validation (which we all do in some form or another, if we’re active: we try to explain the world – and end up Democrat, Republican, Independent, or none of the above! Or a secular humanist, a Christian, a Buddhist, a Muslim, a Hindu, etc., or an Aristotelian! Or “mentally ill” or not! (Aside from or including the domains of life and dilemma and no-dilemma (the grades of dilemma), and the resilience factors.)). I hope this makes sense. It’s a very

clear concept. And here again, psychiatrists need to talk of the physiological! (When I talk about the physiological, I mean body, breath, diet, exercise, physical energy states, and so forth, and how those relate to mental states, perception, and awareness, and how mental states, perception, and awareness relate to those: they are interconnected, and arise in one space, with differentiation or not.) And so much more. Not permanent neurobiogenetic malfunctions and the disorders paradigm, even if some things are noticed that way. (They need a redefined context and explanatory framework. Thus mvo-p and ‘all of the above’ – which includes this paper.)

EOF

Ah! Nice! The result of diligent effort, quiet reflection, and sincere effort. I hope it’s useful. Thanks, Kevin. :-)

Endnote – The Median (A Quote From Stephen Jay Gould)

We still carry the historical baggage of a Platonic heritage that seeks sharp essences and definite boundaries. (Thus we hope to find an unambiguous “beginning of life” or “definition of death,” although nature often comes to us as irreducible continua.) This Platonic heritage, with its emphasis in clear distinctions and separated immutable entities, leads us to view statistical measures of central tendency wrongly, indeed opposite to the appropriate interpretation in our actual world of variation, shadings, and continua. In short, we view means and medians as the hard “realities,” and the variation that permits their calculation as a set of transient and imperfect measurements of this hidden essence. If the median is the reality and variation around the median just a device for its calculation, the “I will probably be dead in eight months” may pass as a reasonable interpretation. [Discussing his prognosis in the face of cancer. He lived for another 20 *years*, on the tail end of the *distribution*. And acknowledging various factors (realities). See the entire article. – Kevin]

– “The Median Isn't the Message” by Stephen Jay Gould, https://www.edwardtufte.com/bboard/q-and-a-fetch-msg?msg_id=0003ms

Endnote – Some Zen Statements

I determined this description recently:

Nonduality: set aside all judgments; this phenomenon and that phenomenon (all dharmas) arise at once.

In psychiatry: things should be noticed as such. One can see that this is a realistic, compassionate view.

I have the following on my mvo webpage:

Dogen writes, “There is nothing, not a single moment nor a single dharma, that is not part of life. There is nothing, not a single matter nor a single state of mind, that is not part of life.”

– Shobogenzo, by Dogen, translated by Nishijima, the essay Zenki (“All Functions”). Dogen (1200-1253) was a Japanese Zen Master and the founder of Japanese Soto Zen.

In psychiatry: things should be noticed as such. One can see that this statement by Dogen is a realistic, penetrating statement.

Endnote – An Example From Christianity

1. Given the frames (trees), in the above.
2. Focus on John 3, the fruits of the Spirit (in ___) ... and you might detect and be able to work with the actual, living Spirit.
3. Note that this is similar to “Meditate [or think] on these things...” (in Philippians 4:8), and is meant to be consistent with it.

Endnote – An Example From Spinoza

1. Given the frames (trees), in the above.
2. Work with Spinoza’s ideas, postulates, axioms, and methods, and see what you determine of God, objects as infinite-being, and inevitable nature as God’s modes. (See Spinoza’s book “Ethics”.)

Endnote – An Example From Dogen

1. Given the frames (trees), in the above.
2. Work with zazen, the oneness of practice and attainment, “Whole being is Buddha-nature.”, being-Buddha-nature, no-Buddha-nature, and impermanence-Buddha-nature, and see what you realize. (See “A Study Of Dogen” by Masao Abe, and Dogen’s “Shobogenzo”.)

Endnote – An Example From Minsky

1. Given the frames (trees), in the above.
2. Study, contemplate, and work with Minsky’s ideas in “The Society Of Mind”, “The Emotion Machine”, and “Inventive Minds”. See how one ascertains this or that about the external world,

whether that is all of this world, how we learn and develop new insights about how the world is, and if that explains how one moves about in this world. See if there's material for cognitive maps – and how various philosophical expressions, and Minsky's own work, might spark such results.

Endnote – An Additional Comment On Structure And Principle

1. Given the frames (trees), in the above.
2. Study, contemplate, reflect on, brainstorm about, wake k-lines from the storehouse of consciousness, think, perhaps think no-thought, and perhaps meditate on the following: how structures that we decide on or frame in our own minds, and principles that we ascertain and put into mental discipline form, might contextualize the frames (trees), in the above, or Minsky's 'combinatorial unfolding interconnected relational action-memes' (as I so term them, from his book "The Society Of Mind") – and how one might investigate the rotation or changed state or new position of this or that leaf or node, and its newly realized state. See if this is stability, or produces a stable, dynamic, and functional situation before one (in perception and being, neither one nor two). See if it leads to ease or insight, or how it connects thinking, thinking non-thinking, and action.

Endnote – An Overview Comment On The Paper Draft 1.05

I worked on this this evening, added some examples. It's an excellent model for how some thoughts/action occur in society, and Minsky uses his 'combinatorial unfolding interconnected relational action-memes' (my term) in his book "The Society Of Mind" to stunning effect, I think; that can go so far.

Draft 1.05. A Theory On Combinatorics, Vis-A-Vis The Individual.

I'll stop there, for now!

But for instance, 1 of the leaves in the tree may be an unusual belief ("psychotic") while 9 leaves may be perfectly routine – or Christian Protestant, or Christian Catholic, or Buddhist, or Hindu, or Muslim, or Spinozean, or Wittgensteinian, or Aristotelian, or common sensical, or everyday, etc. This must be acknowledged within psychiatry – as well as accurate perception of: is that 1 "psychotic" thought a dilemma or not? (in the domains of life (my term): the mental, the existential, the social, the societal, the experiential, the physical). And what if the person shifts a leaf to a new node, or re-contextualizes it, or changes its state? (!)

Key!

:-)

P.S. Does the individual retain the right to Aristotle's affirmation and denial, and universal and individual; or to the no-thing expression and description of Zen and Buddhism? To ethical conduct, wisdom, and mental discipline?

(For this Aristotle citation, see "On Interpretation" by Aristotle.)

Related Papers

"Mvo-P"

"All Of The Above"

"A Description! Start With Data Points And A World-Space. Extrapolate..."

"Expectations And Explanations"