# Vipassana for Hackers

# Paper Three: Why Meditate?

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Meditation requires a time commitment. Like other activities we consider worthy of our time for their benefits to our health, such as sufficient sleep, exercise, fresh air, and a healthy diet, it is often the (rational) first step of individuals considering a meditation practice to ask: Why should I bother? What are the outcomes of meditation? And do the benefits of those outcomes outweigh the time meditation costs the practitioner? This paper answers those questions as they pertain to meditation in general, and to Vipassana, specifically.

#### Keywords: neuroplasticity

#### I. TARGET AUDIENCE

Vipassana for Hackers, Paper One: Curious Mechanics was written with the explicit intention of avoiding a discussion about the specific outcomes or consequences of meditation in detail. That paper was intentionally, though artificially, restricted to the internal mechanics of Vipassana meditation, to pique the interest of potential meditators who had heard of Vipassana elsewhere. Outcomes are discussed only so far as they assist the reader in understanding what is written earlier in the paper regarding human sensory experience. Paper Two: The Brain goes further into the internal mechanics as they pertain to the hub of the nervous system. In the second paper, outcomes are discussed as they pertain to neuroplasticity. Neither paper directly discusses why an individual might choose to try this particular technique of meditation.

As before, the "Hacker" of *Vipassana for Hackers* is not meant to identify computer programmers. Instead, it is meant as a label for a culture of curious and creative people who enjoy exploring, learning, and creating. Librarians, scientists, musicians, architects, medical practitioners, carpenters, artists, lovers of books, mechanics, journalists, academics, hobbyists of all stripes — all "hackers", of a sort. If you think you belong here, you do

Paper Three: Why Meditate? is written for anyone who has ever asked themselves that very question or asked this question of a friend who meditates. It is for both those who are curious about the practice of Vipassana specifically and those who are curious about meditation in general. It is for people who have meditated in other traditions and are curious about the benefits of Vipassana. It is also for people who have never meditated in their entire lives. It is intended for anyone who keeps hearing about Vipassana meditation — in the media, in

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books, and from friends — and wants to learn what all the fuss is about.

The reader need not have read *Paper One* or *Paper Two*. In fact, it is the intention of this paper to be the most accessible of the series. Readers with only a faint interest in the topic of meditation should start here.

# II. THE MUNDANE VS. THE SUPRAMUNDANE

There are two fields of human experience and the following analysis of the value provided by different meditation techniques will break down all points into these two categories. The Mundane in this context refers not to the tedious but to the earthly, the material. Most people will begin meditating for reasons in the mundane field simply because most people have never experienced the supramundane field. The Supramundane in this context refers not to spirituality or religion but experiences which transcend the material, physical world. Put another way, mundane experiences are those which can be described. Supramundane experiences, due to their very nature of transcending the material world, are ineffable. Just because an experience is ineffable, however, does not mean conversation cannot exist around it. An experience of dimethyltryptamine (DMT) may be ineffable but it is almost a guarantee that someone using this drug will talk about it afterward. In this way, we will discuss the consequences of supramundane experiences (and their value) toward the end of this paper.

Because supramundane experiences tend to occur only in deep meditative states, the reasons for meditating listed will predominantly fall in the mundane category. Whether or not the meditator experiences supramundane states in deep meditation, these altered states of mind are never the goal of meditation. The goal of meditation is to change the meditator's mental habits. The intention is to move away from unhealthy mental patterns — those which cause harmful behaviours — toward healthy men-

tal patterns which encourage productive behaviour. Obviously this change is only visible in the mundane world, outside of meditation.

In Paper One: Curious Mechanics, two sample spectrums of meditations were listed. One included activities which were simply meditative, rather than anything which could be considered a formal meditation practice. These included sports, playing a musical instrument, or yogic practices such as asanas and pranayams. We will ignore such activities here. The following plane attempts to roughly locate meditation practices between focus and insight on two axes, rather than one.

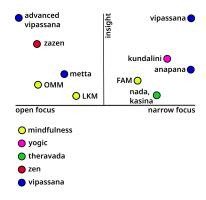


Figure 1: Meditation Quadrants

The locations of different meditation practices on the graph are only for illustrative purposes. There are many other axes available such as a practitioner's experience level, intensity of practice, and an individual's physiology and mental health. However, this plane helps ground a comparison of different meditation techniques for the rest of the paper. The three mindfulness meditation categories are Focused Attention Meditation (FAM), Open Monitoring Meditation (OMM), and Loving-Kindness Meditation (LKM). These will be explained as mindfulness meditations come up in discussion later.

Returning to the topic of the supramundane, the following spectrum illustrates where each of these practices approximately falls, across that dichotomy.

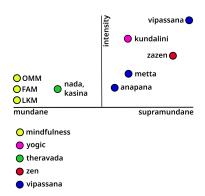


Figure 2: Mundane vs. Supramundane Meditations

Meditations within the mundane sphere are easier to understand and easier to teach. As a consequence, they are easier to submit to rigorous scientific study. Where the broad categories of FAM, OMM, and LKM have been studied scientifically, we will observer respective parallels in Anapana, Vipassana, and Metta meditations.

# III. THE MUNDANE SPHERE OF EXPERIENCE

#### A. Sleep

Why do we have difficulty sleeping? If one imagines a sleepless night of one's past, it often followed an anxietyinducing event or preceded a stressful event. When we fight with a family member or have a difficult day at work, we become anxious and sometimes cannot escape from replaying that event over and over in our mind's eye in exchange for sleep. When the next day brings a final exam or a job interview, we repeatedly imagine the future and its outcomes while we lie awake in bed. Whether we are anxious about the past or the future, it seems that anxiety has a great deal to do with our inability to sleep. Sometimes this anxiety is apparently disconnected from our lives entirely. We may ruminate about anything: long-past childhood experiences, politics, global warming, human suffering at scales completely unmanageable through any actions of our own. Anxiety is anxiety.

And, as it turns out, anxiety has a lot to do with our inability to sleep. When we are anxious we can't sleep. [2, 3] But this relationship is dangerously recursive: when we can't sleep we become anxious. This effect occurs both at the narrow and personally-observable level, within a single night of poor sleep. But it also occurs on a lifelong scale and there is mounting evidence that sleep deprivation in childhood and adulthood has a causal relationship with chronic anxiety. [4, 5]

Meditation objectively improves sleep across a number of meditation techniques. [8] Black et al. found in a 2015 study that this improvement is is not simply over the baseline, however, but also an improvement above and beyond what can be achieved through Sleep Hygiene Education (SHE). [10] The difficulty with this statement, of course, is defining the term "meditation". In this particular study, the meditation in question is *Mindfulness*, as taught in the UCLA Mindfulness Course. [11] Mindfulness is a very accessible form of meditation, varying in format according to the instructor. It usually involves multiple techniques, including *Open Monitoring*, which is characterized by openness to whatever is happening in the present moment in a variety of postures (sitting, standing, walking, eating, etc.); Focused Attention, which is usually a narrow breath awareness meditation; and Loving-Kindness, in which meditators actively direct compassion to themselvse and others. All three of these practices mirror the three meditation practices taught in Vipassana. However, in Vipassana, Open Monitormore refere ing finds its parallel in objective observation of sensation internal to the body, as we will see later.

# B. Meditation vs. Naps

While staying at a friend's house, I excused myself in the evening to meditate. He sincerely asked, "Is meditating for an hour really more valuable than using that time for a good nap?"

The purpose of various forms of meditation should be understood clearly, as the intention of techniques can vary wildly from one to the next. Where the purpose of meditation is simply to relax, it is difficult to say that meditation is more valuable than a nap. Especially for our chronically sleep-deprived society, it's unlikely their effects would differ much.

However, most meditation techniques are not intended to relax the meditator. Whatever the object of a meditation technique (one of the five sense doors, bodily sensation, or objects of mind) the very act of meditation is one of

- posture
- sleep
- digestion ("Make sure to pay attention to your poops!" first course)
- diet
- schedule
- health (activation / motivation)
- ethics (activation / motivation)
- your children: a. knowing how to meditate, b. cross-legged posture
- emotion (i.e. anger)
- gratitute (gratitude vs. fear; julie) https://youtu.be/WPPPFqsECz0
- dealing with death
- mundane sphere / productivity (21 lessons, seinfeld)
- unlearning obsessive / repetitive thought, enhancing creativity
- controlling unbounded sexuality without repression (louis c.k. joke?)
- clarity: in thought, work, planning
- federated, p2p, distributed systems like blockchain / holochain attempt to circumvent structures of oppression and control what if corporations could be rebuilt from inside, one employee/stakeholder at a time such that ethics were inherent to the company's very existence?
- Die Standing Up
- https://www.pnas.org/content/early/2019/ 10/18/1909959116

#### IV. WHY VIPASSANA?

Material notes: free course, code of ethics, 10 days, etc.

# A. Vipassana Basics

Before we get to a discussion about why meditation is valuable, some basic understanding of what meditation is (and isn't) is required.

The technique of Vipassana is based on a single underlying principle:

Every experience which emerges in the mind, whether a thought, emotion, or contact of the five senses, always surfaces with a corresponding sensation in or on the body.

[6]

vedana-samosarana sabbe dhamma. "Everything that arises in the mind starts flowing with a sensation on the body." [7]

It is important to understand this point as it underpins all other aspects of the technique of Vipassana. Someone who is learning Vipassana need not accept this principle as fact. Rather, a 10-day Vipassana course is a sort of laboratory where the principle can be tested and experienced directly.



Figure 3: The sense doors and bodily sensation. [1]

The totality of human experience can be categorized according to the "sense doors" listed in Figure 3: The five external sense doors of sight, sound, taste, smell, and touch are listed at the top. The internal sense door of "mind" is broken down into thought and emotion, second to the bottom. At the very bottom of the diagram is bodily sensation, the object of meditation in Vipassana.

Once these eight experiences are listed, there is no experience left undescribed. All human experience from the mundane (imagination, daydreaming, physical pleasures,

leather

physical discomforts, etc.) to the supramundane (out-of-body experiences, hallucinations, pronounced perceptual time dilation, etc.) are subsets of these seven sense doors and their reflection in bodily sensation, the eighth.

This concept, that sensory input is "reflected" in internal bodily sensation,

Mapping all of sensory experience to these eight categories begs the question of attention, of awareness: Where does the meditator try to fasten her awareness? Where is awareness normally? For the average person, awareness jumps around across these eight categories. Even when one tries to focus on a difficult intellectual problem, the discomforts of back pain and hunger or the distraction of an irritating sound would draw attention away from thought, the desired object of attention. Vipassana meditation asks the meditator to use bodily sensation as a gateway to the other seven sense experiences. Rather than focusing on sound, focus on the sensation generated in the body by the ear sense door. Rather than focusing on a thought or emotion, focus on the sensation in the body generated by that thought or emotion. This is extremely difficult to do, which is why (for lay people, in most cases) a 10-day silent residential course [12] is necessary to learn the technique.

# V. THE SUPRAMUNDANE SPHERE OF EXPERIENCE

 reset frame of reference outside oneself, outside one's own lifetime: "trees for god" and obvious

- karma (sidu/booga smoking)
- Time: Nat Friedman's blog post?
- Is it really possible?
  https://twitter.com/ID\_AA\_Carmack/status/1260698271
  The "speed of thought" (neuron conduction speed) is only 110m/s, which isn't that fast. 9 ms of latency just in your arm!
  https://www.youtube.com/watch?v=MeHoU-arXgY
- bible; "a perfect set of rules"; nature itself <=> perception; "perfect perception (vision)"; inner perception (sensation mirror) harris v. peterson
- clarification: "isn't that what makes us human?" (emotions) rather, what makes us animal
- "How to Change Your Mind" ego dissolution specific advantages?
- seeing oneself as aggregate and the path from singular => aggregate (neuroscience behind hemispheres)

#### ACKNOWLEDGEMENTS

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