

Naval Ravikant Blogs Compilation

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GROUPS SEARCH FOR CONSENSUS, INDIVIDUALS SEARCH FOR TRUTH

Naval: What's considered to be true is fought over. Individuals search for truth but groups search for consensus—and society is the largest group. So the biggest problem we run into is this: What society wants for you is not always what's good for you.

Even smart people go along with society's lies

Even smart, critical thinkers go along with many of society's truths, knowing deep down they are lies.

Here's a simple example: "Money won't make you happy" is a social truth, but it's not an individual truth. Look at all the individuals trying to make money. They know money can remove a lot of sources of unhappiness and get them to a point where happiness is under their control. It becomes their choice, as opposed to being inflicted upon them by external forces.

That is just one of many lies society tells you.

Another one of society's lies is that you send your kids to school for education. In fact, they get an hour of education a day and indoctrination the rest of the time. They're taught at the speed of the slowest student, and they're mostly taught subjects that are irrelevant or obsolete.

School is a combination of a bit of education, large doses of socialization and compliance training, and a massive dose of babysitting—which is helpful for parents who can't take care of their kids at home. It also keeps young troublemakers off the street.

School does a lot of things, but education is just a tiny piece of it. Homeschooling stats clearly show this, and even unschooling stats are starting to show it.

Guilt is society training you to be your own warden

Society does not just lie to you. It programs you to beat yourself up when you transgress one of its truths. Guilt is society programming you so effectively that you become your own warden. Guilt is society's voice speaking in your head.

Truth-seeking is a hard business. You essentially have to understand, with deep conviction, things that you've been programmed to misunderstand.

THE PATH TO PEACE IS TRUTH

Naval: The search for peace is really the search for truth. Try to see the advantage of understanding things by discovering the truth rather than by practice.

When you discover the truth, bad habits can disappear

Let's say I'm trying to quit smoking. There are techniques I can try, but they're always painful and difficult. Often, a moment will come when I see myself in a new way that allows the habit to disappear by itself. I get a diagnosis of lung cancer and understand I'm going to die, or I see a friend get in trouble with similar bad habits. When I see something clearly enough and understand it, the bad habit can dissolve by itself.

More broadly, I may see some facet of myself that I don't like. Maybe I see it in a friend and then can't unsee it to the point that we can no longer be friends.

Self-improvement is just a dressed up form of self-conflict

Seeing and understanding things leads to changes that practice and technique cannot achieve. When you're following a technique, there's always a gap between you and the thing you're trying to achieve. There's always repetition, struggle and conflict.

If we want peace, we have to give up on self-conflict. We even have to give up on self-improvement, because self-improvement is just a dressed up form of self-conflict. Instead, we need to use our natural curiosity to understand things better. Through understanding, we will naturally improve ourselves.

Once we truly understand the effects of unhealthy food on our bodies—when we see the extra weight we're carrying, or we track the glucose spike and crash after eating too much sugar, or we see how caffeine hops us up and then crashes us—we automatically change for the better.

So, the path towards peace is truth.

THE CLOSER YOU ARE TO THE TRUTH, THE MORE SILENT YOU BECOME INSIDE

Naval: I put out this tweet a while back: "The closer you are to the truth, the more silent you become inside."

We intuitively know this. When someone is blabbing too much or being the court jester, you know they're not at peace. You know Robin Williams was not peaceful inside.

Wisdom begets stoicism

We expect a wise person like a Lao Tzu or Socrates to be quiet—not because they're trying to look wise, but because they're internally quiet. We understand that peace and wisdom go together.

Kapil Gupta, who's written far more on this topic than I have, said, "Wisdom begets stoicism. Stoicism does not beget wisdom." As you become wise, you naturally become stoic. You don't become wise by being stoic. That's reversing the cart and horse.

As an aside, one of my tweets the other day got incredibly misinterpreted. So many people failed that IQ test. I wrote, "The smarter you get, the slower you read." The speed reading crowd got triggered, and people said, "Well, Bill Gates reads 150 books per year." Others said, "I read really slowly, so I must be smart." They got it wrong. I said, "If A, then B." That doesn't mean, "If B, then A."

HAPPINESS IS PEACE IN MOTION

Naval: In some ways, modern life is more hectic than prehistoric times. Our sources of stress are more chronic.

Let's define stress. In physical terms, stress happens when something wants to be in two places at one time. If I apply pressure to both ends of an iron beam, I create stress on the beam because one part wants to be north and the other part wants to be south.

Stress is an inability to decide what's important

In mental terms, stress is an inability to decide what's important. You want two incompatible things at once. I want to relax, but I need to work. Now I'm under stress.

When you give up on something, it's no longer stressful. When you accept that something's out of your control, there's no point in getting stressed about it.

The mind constantly creates stress, making you more paranoid or angry than situations warrant.

You want to find peace from mind. You aren't turning off your brain. You can't suppress the mind or force it to do anything. If I say, "Don't think of a white elephant," you'll think of a white elephant. Rather, you want to develop tools so your mind can calm down on its own. Then, stress will go away naturally.

How do you do that? How do you end up with a more peaceful mind?

Peace is happiness at rest

Here's a phrase I like: "Peace is happiness at rest; happiness is peace in motion." Someone who's peaceful at rest will end up happy when they do an activity. While a happy person sitting idle will be peaceful. The ultimate goal is not happiness, even though we use that term a lot. The goal is peace.

So the question becomes: How do you get to peace?

The first problem with attaining peace is that no activity will get you there. Fundamentally, peace is inactivity; it's a sense that everything is fine.

If everything is fine, you're not doing any physical or mental activity to change it. You're also not wishing you were doing something to change it, because that creates stress.

You cannot work toward peace, only understanding

You cannot achieve peace directly or even work toward it. Rather, you can work toward understanding. There's an old Sikh saying, "The name of God is truth." When you understand certain things and they become a part of you, you naturally become a more peaceful person.

FINDING PEACE FROM MIND

Naval: Let's talk about peace, and then we'll talk about truth and how they relate to happiness.

When I say you want to be happy, what I'm actually saying is you want to find peace. We say peace of mind, but what we really want is peace from mind.

The mind goes quiet during the moments of greatest pleasure

During your moments of greatest pleasure—whether you're doing a drug, having an orgasm, finding your edge kite-surfing, laughing with a friend or looking at an incredible sunset—your mind goes quiet. It calms down, and that voice in your head goes silent. You achieve a sense of awe, which you might also call beauty, bliss or joy.

We all seek this. We all chase it. Deep down, what we're actually looking for is peace from mind.

Somewhere along the way, the mind became a master

I'm not making the mind out to be an enemy. It's a very useful tool. But somewhere along the way, it became uncontrollable. The mind became the master rather than a servant.

Our mind evolved to be paranoid, fearful and angry. Humans are the most paranoid and angry creatures to ever walk the earth. We are apex predators who dominated the food chain by killing, subjugating or domesticating every other species on this planet. We did it through fear, violence and, of course, cooperation.

Nature is brutal. Turn on any nature documentary and you'll see: A eats B; B eats C; C eats D; D eats E. Nature is red in tooth and claw. We are derived from violence and blood.

Our environment rewards pessimism and paranoia

Modern society's a lot safer and more peaceful. It still makes sense to be careful, maintain some paranoia and occasionally to get angry—but not as much as we're hardwired to do. It's okay to dial it down.

The threat level is not as high as our genes think. If you were walking through the woods 1,000 years ago and heard something rustling in the bushes, you'd be right to be paranoid. Let's say nine out of 10 times it's a rabbit in the bushes, and one out of 10 times it's a tiger. The optimist would catch a rabbit nine out of 10 times and get eaten by a tiger the 10th. The pessimist survives every time.

Our evolved nature rewards pessimism. But we live in much safer times, so we must find ways past that and work towards peace.

BREAKING ADDICTION IS SOCIALLY UNACCEPTABLE

Naval: If you drink alcohol or take some kind of drug regularly, try the following thought experiment.

What events do you most look forward to? I'll bet they're the ones where you get to drink or do drugs. You look forward to dinnertime, an upcoming party or bar-hopping with friends.

To see how artificial it is, resolve to abstain from drinking or doing drugs the next time you go out. Now ask yourself how much you're looking forward to that event. You'll find: not at all.

This creates a conundrum. These sources of artificial pleasure eventually will desensitize me, bring misery when they're gone and lead to addiction. But if I give them up, I'll also be miserable because I'll no longer socialize with my friends. I won't go out, and I won't have fun.

Breaking addiction requires a new lifestyle

Breaking addiction is very hard, because you have to break the physical addiction and you also have to change your lifestyle. You have to switch to a lifestyle in which you can be happy without that substance.

If I drink to be social and do that enough, I'll find myself hanging out with people I wouldn't spend time with otherwise. When I'm sober, I can't tolerate these people, the topics we discuss or the venues we visit. I can only do it drunk.

Addiction holds together fake relationships and fake activities

These fake relationships and fake activities are held together by alcohol. If I stop drinking, I have to replace my friends and find new things to do. This is difficult and socially unacceptable.

I realized a while ago that it's a problem to look forward to weekends and holidays. First, it takes the joy out of the everyday, because you're living in the future and suffering the rest of time. Second, you have accepted a way of life in which most of your time is spent suffering.

THE MODERN STRUGGLE IS FIGHTING WEAPONIZED ADDICTION

Naval: On some very deep level, all pleasure creates its own offsetting pain and fear of loss. I recently tweeted, "In an age of abundance, pursuing pleasure for its own sake creates addiction." I was upgrading a Miyamoto Musashi line, "Do not seek pleasure for its own sake."

Musashi was a Japanese swordsman. In his time, pursuing pleasure meant a very different thing than it does today. He didn't have unlimited processed food, Internet pornography, marijuana and alcohol available on demand.

Now that we're in an age of abundance, we can easily fall into addiction if we pursue pleasure for its own sake. And that's hard to get out of.

The modern struggle is really about individuals—disconnected from their tribe, religion and cultural networks—who are trying to stand up to all these addictions that have been weaponized: alcohol, drugs, pornography, processed foods, news media, Internet, social media and video games.

Addictions are fake work and fake play

Addictions let you engage in fake play and fake work. Before, you had to go socialize with friends; now, you can just get drunk with a bunch of strangers. Before, you had to go find a mate, create children and raise a family; now, you can just watch a lot of porn. Before, you had to hunt and climb trees to get fruit for a little bit of natural sweetness; now, you can buy all the gelato you want.

The modern struggle is standing up to these weaponized addictions. They give you small doses of pleasure, but they also desensitize you and expose you to the misery of their absence.

WORK THE LEAST FOR IT

Naval: The quality of our decisions is paramount in the modern age, because we're all leveraged. You can be leveraged through code, community, media, capital, labor and other ways. If you're smart, you leverage every decision you make.

If Warren Buffett makes the right decision 85% of the time and his competitors get it right 70% of the time, Buffett will win everything. That's a source of his strength: good decision making. He makes one or two decisions a year. Most of the time he's sitting around reading books, thinking, reading S-1s, playing bridge, traveling and golfing.

Obviously, hard work is not the solution. Good decision making and high leverage is the solution.

A peaceful mind makes better decisions

Having a peaceful mind, being a happier person, relying less on momentary pleasure and being calmer will give you the frame of mind to make better decisions. Being happy will actually increase your effectiveness. As long as the increase in effectiveness is higher than the reduction in drive, you're well off.

Ask yourself: Would you rather be the best in the world by working the hardest for it or by working the least for it, because you worked the most intelligently?

Imagine you are the universal god. You are omniscient and omnipotent. You could change anything in the universe just by pushing a butterfly in one direction, because you know exactly how the particles will collide from there on out.

Omniscience is omnipotence. Knowledge is power. We can achieve happiness purely through knowledge, and that happiness will improve our decision making. That happiness will give us more time to read; make us more knowledgeable about how we operate and other people operate; make us more effective; and improve our judgment. It should also increase our earnings and the returns we need to be financially free.

BEING UNHAPPY IS EXTREMELY INEFFICIENT

Naval: Besides “I’m too smart for it,” the other objection is, “I don’t want it to lower my productivity. I don’t want to have less desire or less work ethic.”

Fact check on that is: True. The happier and more peaceful you are, the less likely you are to run out and change the world. At the same time, being unhappy is very inefficient. A peaceful person doesn’t have extraneous thoughts going through their head. If you’re a driven, unhappy person, your mind will be on 24/7.

Unhappy people don’t have good judgment

What are the consequences of this? You won’t sleep well. You’re much more likely to react with anger and dig yourself into a hole you have to dig out of. Your decisions are emotional and impetuous. You’re more likely to get caught in the busy trap—busy all the time and running from one thing to another because you can’t mentally prioritize.

When you don’t have peace of mind, it’s difficult to make judgments because you have too many threads going through your head. You don’t have time to devote to making those judgments.

There’s a tradeoff. If you become the Buddha tomorrow, it’s unlikely you’ll also launch rockets to the moon like Elon Musk. On the other hand, there are plenty of successful, optimistic scientists, innovators and other leaders—especially as they get older. Happy people aren’t always ineffective.

A peaceful mind makes better decisions

When I got happier in my own life, I became much more effective—even though I don’t work as hard as I used to. I’m able to form relationships with people who I would have kept at a distance earlier in my life, for whatever preconceived notions I held.

I make decisions much more clearly now, because I can see the long-term outcomes. I cut straight to the chase and don't try and negotiate an extra 20% here or there—because I know that's going to make me unhappy in the long-term, make the other person unhappy, and make the deal less stable.

I've become more productive even though I don't work as hard, because I make better decisions.

IF YOU'RE SO SMART, WHY AREN'T YOU HAPPY?

Naval: "Happiness is for stupid people." That's a common complaint I hear from smart overachievers. They think only dumb or lazy people can be happy. Entrepreneurs will say, "I don't want to be happy because I want to be successful." They worry that if they get too happy they'll lose their desire and won't work hard anymore.

Can you increase happiness without losing your drive?

Like everything else, there is some truth to this. Generally, the more intelligent you are, the more you can see behind the façade of everyday life being easy or safe. You see all the risks and downsides—the calamities that await us. You see the cynicism and manipulation behind so many things portrayed as being good for you or society. You become cynical, and you signal your intelligence through cynicism. Very smart people often communicate in purely cynical observations.

It's OK to not want to be happy. But we're going to explore whether you can increase your happiness without significantly lowering your drive or intellect.

Let's take the first objection: "I'm not happy because I'm smart." This is partially true. You are unhappy partially because you know and understand too much. You've been exposed to too much. But that doesn't mean that you can't be happy and retain your intelligence.

Figuring out the truth will lead to happiness

But don't get it backwards: You're not smart because you're unhappy; you're unhappy because you're smart. You can be happy and smart—it's just going to take more work. The good news is, smart people are good at figuring out the truth. The more you dig into certain deep truths, the freer and more peaceful you will become. That peace will lead to happiness.

If you're so smart, why aren't you happy? I absolutely believe that is true. The beauty of being mentally high functioning in our society is that you can trade it for almost anything. If you're smart, you can figure out how to be healthy within your genetic constraints and how to be wealthy within your environmental constraints.

If you're smart, you can figure out how to be happy within your biological constraints. But your biological constraints are a lot larger than you might think.

The dynamic range of happiness is quite large

If you've ever gotten drunk or achieved an altered state of mind on psychedelic drugs or through meditation, breathing or other hypnotic techniques, you have experienced brief moments of happiness beyond what you feel on a typical day.

Of course, some of this is a fake, pleasure-driven happiness. But there's truth to it; otherwise, you wouldn't desire that state.

Achieving these brief states of happiness can show you how dynamic your range is—and that range can be quite large.

How do you nudge yourself in that direction on a perpetual basis, as opposed to visiting it by stunning your mind into submission and silence?

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DESIRE IS A CONTRACT YOU MAKE TO BE UNHAPPY

Naval: Desire's a contract you make to be unhappy until you get what you want. You become disturbed because you want something. Then you work really hard to get it and are miserable in the meantime. Finally, when you get it, you revert to the state you were in before you had it. It's not like you achieve some peak level of bliss that you stay on forever.

No single thing will make you happy forever

People hold onto a delusion that there's something out there that will make them happy and fulfilled forever. No single thing can do that.

Enlightenment is something different. It seems to be a permanent solution; but we're not going to explore that just yet. We're just talking about common sense happiness.

Happiness is a process of understanding and self-discovery

There's no single permanent solution to happiness. Rather, achieving happiness requires a process of understanding and self-discovery. It is a process of training yourself to see certain truths.

If obtaining things made us permanently happy, then the cavemen would have been miserable, and we would all be deliriously happy. Yet, net happiness per person is not going up and might even be going down. Modernity probably brings more unhappiness than the past.

So happiness is returning to the state where nothing is missing in this moment.

HAPPINESS IS A SKILL YOU CAN DEVELOP

Naval: The first step to increasing your level of happiness is realizing you can. This is where a lot of people get tripped up. For the vast majority of people, some of their happiness—probably a lot more than they think—is in their control.

This step is not easy. You might be stuck on this for a long time. Many people believe that happiness cannot be developed or changed, so they devalue it. They say, "Well, I don't want to be happy."

Genetics is important, but it's only half the picture

Genetics is important. It goes a long way in determining strength, athletic performance and intelligence. But your genetic set point is only about half of it. And happiness, or general contentment, is much more malleable than the other things.

It would be very hard for me to change my athletic performance dramatically purely by working out. I'm much more limited in that arena because of my genetics. But things like my temperament, outlook on life, how peaceful I am, how angry I get—these are much more in my control.

You're not stuck at your level of happiness

So, happiness is a skill like nutrition and fitness. Happiness is a skill you identify and develop that slowly gives you results as you get better at it. It is not God-given. It's not handed to you and now you're stuck with it—though if you start with a high setting, by all means keep it.

HAPPINESS IS NOT SCIENCE OR MATH

Naval: Happiness is an extremely loaded term. It means completely different things to different people. Everybody has strong preconceived notions of what happiness is and how they can attain it.

There are many types of happiness

I'm going to conflate happiness, pleasure, peace, joy, bliss, contentment, well-being and more. I don't do it deliberately.

But at the same time, this is not math. We cannot clearly bound these words. They mean different things in different contexts to different people. So try and get into the spirit of what I'm saying, rather than getting hung up on specific words and details.

When some people talk about happiness, they're really talking about pleasure or thrills. They might say, "I had a really good meal; therefore, I'm happy." When other people are talking about happiness, they're talking about a general state of contentment and well-being. Other people are referring to enlightenment, like a Buddha would have reached.

Many people take the point of view that there's no such thing as happiness or that happiness is counterproductive—or that misery comes from pursuing happiness. There's a lot of truth to these ideas; we'll get into it.

Happiness is more like poetry than algorithms

I might say, “The way to be happy is X,” and people will respond, “Well, didn’t you just say happiness is a cause of misery?” This is not mathematics. You can’t link algorithms together.

This is more like poetry. If you read 50 poems by the same poet and try to map them out analytically and map words from one poem to another and see if it makes sense, you’ll miss the point. Don’t fixate on the words. Don’t even fixate on the sentences. Ponder the overall thought process and message.

HAPPINESS WITHOUT MATERIAL COMFORT IS PLAYING ON HARD MODE

Naval: You can achieve happiness without financial wealth. Most of us recognize you’re not going to buy your way to happiness. But in modern times, you can buy your way out of common causes of unhappiness. Financial wealth can give you freedom and more time. It can give you peace.

Renouncing things is not an easy path to happiness

In olden times, one of the routes to finding peace was becoming a monk. You would renounce things—sex, shelter, money and other material attachments—and go off in the woods. You might find some peace after 30 years, when you’d finally gotten over the fact that you weren’t going to have these things. The truth is, most of them probably never got over it. There are lots of monks out there but there aren’t a lot of enlightened people.

It’s easier to fulfill your material needs than to renounce them

It was Osho who said, essentially: “Every time I meet a prostitute, she wants to talk about God. And every time I meet a priest, he wants to talk about sex.” Whatever you deny yourself will become your new prison.

Today it’s actually easier to fulfill your desire for material comfort than it is to renounce it. It’ll take you a lifetime to renounce material comfort, and it still might not work. But you can make be materially successful in less than a lifetime.

You can achieve happiness without material comfort, and it probably would be a more lasting form of happiness. But that's playing on hard mode.

When you're sick, your desires run away

Physical health is the foundation of everything. If you don't have your physical health, you have nothing. A Confucius saying I like: "A sick man only wants one thing, a healthy man wants 10,000 things." When you're sick, your desires run away. Without the ability to get up and function, you can't turn into the desiring machine that you are.

Although physical health is the most important, I speak the least about it because it's the area where I have the least specific knowledge. I am not self-actualized in that regard. I'm in OK shape and have an OK diet. I understand the theories of physical health, but I would feel fraudulent offering it to you unless I were a paragon of physical health myself.

I've gone from being unhappy to being very happy

In wealth, I'm much more self-actualized. And on the mental health side—finding happiness and peace—I've gone from being a mostly unhappy person to being very happy. That was deliberate. It was practiced and effort-based. It happened through realizations. Because I made progress, I can tell you what worked for me.

LIVE LONG ENOUGH AND YOU'LL BECOME A PHILOSOPHER

Naval: Let's talk about why we're doing this podcast. It's really a discussion of highly practical philosophy.

Philosophy, as we normally think of it, is impractical. It's abstract and obtuse—something written a long time ago in fancy language. We put it on a pedestal and it feels unapproachable. Sometimes it comes across like truisms.

The big problems are the old ones

But if you live long enough, you will become a philosopher yourself. You'll have spent a lifetime solving the big problems in your life. The big problems are the old ones, the ones we've been trying to solve since the beginning: How do I stay happy? How do I become healthy? How do I become wealthy? How do I raise the family I want?

What one monkey can do, another can do

This podcast is about practical philosophy that has worked for us. What one monkey can do, another can. We want people to think, "If this person learned something that made them happier, healthier or wealthier, then I can do it too." That's what we focus on: a practical philosophy of health, wealth and happiness.

Nivi: If you summed it up in one word, it would be health: financial health, mental health and physical health.

Naval: Health is a state of well-being. Let's get to a state of financial health where we're not fearful day to day. That's where we started, and we spent a lot of time on that. Let's get to a state of physical health where we're not suffering from afflictions, disease and addiction. Let's get to a state of mental health where we're relatively at peace and quite content with ourselves.

FINDING TIME TO INVEST IN YOURSELF

This is a transcript of the bonus material at the end of the giant How to Get Rich episode.

Nivi: A common question we get: "How do I find the time to start investing in myself? I have a job."

You have to rent your time to get started

In one of the tweets from the cutting room floor, you wrote: “You will need to rent your time to get started. This is only acceptable when you are learning and saving. Preferably in a business where society does not yet know how to train people and apprenticeship is the only model.”

Naval: Try to learn something that people haven’t quite figured out how to teach yet. That can happen if you’re working in a new and quickly expanding field. It’s also common in fields that are circumstantial—where the details matter and it’s always moving. Investing is one of those fields; so is entrepreneurship.

Chief of Staff for a founder is one of the most coveted jobs for young people starting out in Silicon Valley. The brightest kids will follow an entrepreneur around and do whatever he or she needs them to do.

In many cases, the person is way overqualified. Someone with multiple graduate degrees might be running the CEO’s laundry because that’s the most important thing at the moment.

At the same time, that person gets to attend the most important meetings. They are privy to all the stress and theatrics, the fundraising decks and the innovation—knowledge that can only come from being in the room.

Coming out of college, Warren Buffett wanted to work for Benjamin Graham to learn to be a value investor. Buffett offered to work for free, and Graham responded, “You’re overpriced.” What that means is you have to make sacrifices to take on an apprenticeship.

Find the part of the job with the steepest learning curve

If you can’t learn in an apprenticeship model because you need to make money, try to be innovative in the context of your job. Take on new challenges and responsibilities. Find the part of the job with the steepest learning curve.

You want to avoid repetitive drudgery—that’s just biding time until your job is automated away.

If you’re a barista at the coffee shop, figure out how to make connections with the customers. Figure out how to innovate the service you offer and delight the customer. Managers, founders and owners will take notice.

Develop a founder mentality

The hardest thing for any founder is finding employees with a founder mentality. This is a fancy way of saying they care enough.

People will say, “Well, I’m not the founder. I’m not being paid enough to care.” Actually, you are: The knowledge and skills you gain by developing a founder mentality set you up to be a founder down the line; that’s your compensation.

You can get a lot out of almost any position. You just have to put a lot into it.

Accountability is something you can take on immediately

Nivi: We’ve discussed accountability, judgment, specific knowledge and leverage. If I’m working a “normal” job, is specific knowledge the one I should focus on?

Naval: Judgment takes experience. It takes a lot of time to build up. You have to put yourself in positions where you can exercise judgment. That’ll come from taking on accountability.

Leverage is something that society gives you after you’ve demonstrated judgment. You can get it faster by learning high-leverage skills like coding or working with the media. These are permissionless leverage. This is why I encourage people to learn to code or produce media, even if it’s just nights and weekends.

So, judgment and leverage tend to come later. Accountability is something you can take on immediately. You can say, “Hey, I’ll take charge of this thing that nobody wants to take charge of.” When you take on accountability, you’re also publicly putting your neck on the chopping block—so you have to deliver.

You build specific knowledge by taking accountability for things that other people don’t know how to do. Perhaps they’re things you enjoy doing or are naturally inclined towards doing anyway.

If you work in a factory, the hardest thing may be raising capital to keep the factory running. Maybe that’s what the owner is always stressed out about.

You might notice this and think, “I’m good at balancing my checkbook and have a good head for numbers; but I haven’t raised money before.” You offer to help and become the owner’s sidekick solving their fundraising problem. If you have a natural aptitude and take on accountability, you can put yourself in a position to learn quickly. Before long, you’ll become the heir apparent.

Early on, find things that interest you and allow you to take on accountability. Don’t worry about short-term compensation. Compensation comes when you’re tired of waiting for it and have given up on it. This is the way the whole system works.

If you take on accountability and solve problems on the edge of knowledge that others can’t solve, people will line up behind you. The leverage will come.

Specific knowledge can be timely or timeless

There are two forms of specific knowledge: timely and timeless.

If you become a world-class expert in machine learning just as it takes off and you got there through genuine intellectual interest, you’re going to do really well. But 20 years from now, machine learning may be second hat; the world may have moved on to something else. That’s timely knowledge.

If you’re good at persuading people, it’s probably a skill you picked up early on in life. It’s always going to apply, because persuading people is always going to be valuable. That’s timeless knowledge.

Now, persuasion is a generic skill—it’s probably not enough to build a career on. You need to combine it in a skill stack, as Scott Adams writes. You might combine persuasion with accounting and an understanding of semiconductor production lines. Now you can become the best semiconductor salesperson and, later on, the best semiconductor company CEO.

Timeless specific knowledge usually can’t be taught, and it sticks with you forever. Timely specific knowledge comes and goes; but it tends to have a fairly long shelf life.

Technology is a good place to find those timely skills sets. If you can bring in a more generic specialized knowledge skill set from the outside, then you’ve got gold.

Technology is an intellectual frontier for gaining specific knowledge

Nivi: There were a couple other tweets from the cutting-room floor on this topic. The first: “The technology industry is a great place to acquire specific knowledge. The frontier is always moving forward. If you are genuinely intellectually curious, you will acquire the knowledge ahead of others.”

Naval: Danny Hillis famously said technology is everything that doesn’t work yet. Technology is around us everywhere. The spoon was technology once; fire was technology once. When we figured out how to make them work, they disappeared in the background and became part of our everyday lives.

Technology is, by definition, the intellectual frontier. It’s taking things from science and culture that we have not figured out how to mass produce or create efficiently and figuring out how to commercialize it and make it available to everybody.

Technology will always be a great field where you can pick up specific knowledge that is valuable to society.

If you don’t have accountability, do something different

Nivi: Here’s another tweet from the cutting-room floor related to accountability: “Companies don’t know how to measure outputs, so they measure inputs instead. Work in a way that your outputs are visible and measurable. If you don’t have accountability, do something different.”

Naval: The entire structure of rewarding people comes from the agricultural and industrial ages, when inputs and outputs matched up closely. The amount of hours you put into doing something was a reliable proxy for what kind of output you’d get.

Today, it’s extremely nonlinear. One good investment decision can make a company \$10 million or \$100 million. One good product feature can be the difference between product-market fit and complete failure.

As a result, judgment and accountability matter much more. Often the best engineers aren’t the hardest workers. Sometimes they don’t work very hard at all, but they dependably ship that one critical product

at just the right time. It's similar to the salesperson who closes the huge deal that makes the company's numbers for the quarter.

People need to be able to tell what role you had in the company's success. That doesn't mean stomping all over your team—people are extremely sensitive to others taking too much credit. You always want to be giving out credit. Smart people will know who was responsible.

Some jobs are too removed from the customer for this type of accountability. You're just a cog in a machine.

Consulting is a good example. As a consultant, your ideas are delivered through someone else within the organization. You may not have visibility to the top people; you may be hidden behind a screen. That's a trade-off you're making in exchange for your independence.

You'll develop thick-skin if you take on accountability

When you have accountability, you get a lot more credit when things go right. Of course, the downside is you get hurt a lot more when things go wrong. When you stick your neck out, you have to be willing to be blamed, sacrificed and even attacked.

If you're the kind of person who thrives in a high-accountability environment, you're going to end up thick-skinned over time. You're going to get hurt a lot. People are going to attack you if you fail.

Scale your specific knowledge with apprentices

Nivi: Once you get some specific knowledge, you can scale it by training your own apprentices and outsourcing tasks to them.

Naval: For example, I made good investments and figured out the venture business. I could have kept doing that and making money. Instead, I co-founded Spearhead to train up-and-coming founders to become angels and venture investors. We give them a checkbook to start investing.

It's an apprenticeship model. They come to us with deals they're looking at, and we help them think it through. This model is more scalable than my personal investing.

Specific knowledge comes on the job, not in a classroom

At Spearhead we lead classes teaching founders about investing, and we also hold office hours to discuss specific deals they bring.

It turns out the classes and talks we lead are largely worthless. You can give all the generic advice people need in about an hour. After that, the advice gets so circumstantial that it essentially cancels to zero. But the office hours are incredibly useful.

This reinforces the notion that investing is one of those skills that can only be learned on the job. When you find a skill like that, you're dealing with specific knowledge.

Another good indicator of specific knowledge is when someone can't give a straight answer to the question: "What do you do every day?" Or you get an answer along the lines of, "Every day is different based on what's going on."

The thing is so complicated and dependent upon circumstances that it can't be boiled down into a textbook form.

Nivi: The mafia figured out this apprenticeship model a long time ago. The best way to end up running one of the families was to become the driver for the Don.

Naval: Tony Soprano was a businessman who had to enforce his own contracts. That's a very complicated business.

HOW TO GET RICH: EVERY EPISODE

This giant episode collects all of the interviews about my ‘How to Get Rich’ tweetstorm. It includes 10 minutes of unreleased material at the end.

Wealth is assets that earn while you sleep

Naval is a prolific tech investor and founder of AngelList

Nivi: You probably know Naval from his Twitter account.

We’re going to talk about his tweetstorm, “How To Get Rich (without getting lucky).” We’ll go through most of the tweets in detail, give Naval a chance to expand on them and generally riff on the topic. He’ll probably throw in ideas he hasn’t published before.

Naval’s the co-founder of AngelList and Epinions. He’s also a prolific tech investor in companies like Twitter, Uber and many more.

I’m the co-founder of AngelList with Naval. And I co-authored the Venture Hacks blog with him back in the day.

Naval: The “How to Get Rich” tweetstorm definitely hit a nerve and went viral. A lot of people say it was helpful and reached across aisles.

People outside of the tech industry—people in all walks of life—want to know how to solve their money problems. Everyone vaguely knows they want to be wealthy, but they don’t have a good set of principles to do it by.

Wealth is assets that earn while you sleep

Nivi: What’s the difference between wealth, money and status?

Naval: Wealth is the thing you want. Wealth is assets that earn while you sleep; it's the factory of robots cranking out things. Wealth is the computer program running at night that's serving other customers. Wealth is money in the bank that is reinvested into other assets and businesses.

A house can be a form of wealth, because you can rent it out; although that's a less productive use of land than running a commercial enterprise.

My definition of wealth is oriented toward businesses and assets that can earn while you sleep.

Wealth buys your freedom

You want wealth because it buys you freedom—so you don't have to wear a tie like a collar around your neck; so you don't have to wake up at 7:00 a.m. to rush to work and sit in commute traffic; so you don't have to waste your life grinding productive hours away into a soulless job that doesn't fulfill you.

The purpose of wealth is freedom; it's nothing more than that. It's not to buy fur coats, or to drive Ferraris, or to sail yachts, or to jet around the world in a Gulf Stream. That stuff gets really boring and stupid, really fast. It's about being your own sovereign individual.

You're not going to get that unless you really want it. The entire world wants it, and the entire world is working hard at it.

It is competitive to some extent. It's a positive sum game—but there are competitive elements to it, because there's a finite amount of resources right now in society. To get the resources to do what you want, you have to stand out.

Money is how we transfer wealth

Money is how we transfer wealth. Money is social credits; it's the ability to have credits and debits of other people's time.

If I do my job right and create value for society, society says, "Oh, thank you. We owe you something in the future for the work that you did. Here's a little IOU. Let's call that money."

That money gets debased because people steal the IOUs; the government prints extra IOUs; and people renege on their IOUs. But money tries to be a reliable IOU from society that you are owed something for something you did in the past.

We transfer these IOUs around; money is how we transfer wealth.

Status is your rank in the social hierarchy

There are fundamentally two huge games in life that people play. One is the money game. Money is not going to solve all of your problems; but it's going to solve all of your money problems. I think people know that. They realize that, so they want to make money.

At the same time, deep down many people believe they can't make it; so they don't want any wealth creation to happen. They virtue signal by attacking the whole enterprise, saying, "Well, making money is evil. You shouldn't do it."

But they're actually playing the other game, which is the status game. They're trying to be high status in the eyes of others by saying, "Well, I don't need money. We don't want money."

Status is your ranking in the social hierarchy.

Wealth is not a zero-sum game. Everybody in the world can have a house. Because you have a house doesn't take away from my ability to have a house. If anything, the more houses that are built, the easier it becomes to build houses, the more we know about building houses, and the more people can have houses.

Wealth is a very positive-sum game. We create things together. We're starting this endeavor to create a piece of art that explains what we're doing. At the end of it, something brand new will be created. It's a positive-sum game.

Status is a very old game

Status, on the other hand, is a zero-sum game. It's a very old game. We've been playing it since monkey tribes. It's hierarchical. Who's number one? Who's number two? Who's number three? And for number three to move to number two, number two has to move out of that slot. So, status is a zero-sum game.

Politics is an example of a status game. Even sports is an example of a status game. To be the winner, there must be a loser. Fundamentally, I don't like status games. They play an important role in our society, so we can figure out who's in charge. But you play them because they're a necessary evil.

On an evolutionary basis—if you go back thousands of years—status is a much better predictor of survival than wealth. You couldn't have wealth before the farming age because you couldn't store things. Hunter-gatherers carried everything on their backs.

Hunter-gatherers lived in entirely status-based societies. Farmers started going to wealth-based societies. The modern industrial economies are much more heavily wealth-based societies.

People creating wealth will always be attacked by people playing status games

There's always a subtle competition going on between status and wealth. For example, when journalists attack rich people or the tech industry, they're really bidding for status. They're saying, "No, the people are more important. And I, the journalist, represent the people, and therefore I am more important."

The problem is, to win at a status game you have to put somebody else down. That's why you should avoid status games in your life—because they make you into an angry combative person. You're always fighting to put other people down and elevate yourself and the people you like.

Status games are always going to exist; there's no way around it. Realize that most of the time when you're trying to create wealth, you're getting attacked by someone else and they're trying to look like a goody-two shoes. They're trying to up their own status at your expense.

They're playing a different game. And it's a worse game. It's a zero-sum game, instead of a positive-sum game.

Wealth isn't about taking something from somebody else

Ethical wealth creation makes abundance for the world

Naval: I think there is this notion that making money is evil, right? It's rooted all the way back down to "money is the root of all evil." People think that the bankers steal our money. It's somewhat true in that, in a lot of the world, there's a lot of theft going on all the time.

The history of the world, in some sense, is this predator/prey relationship between makers and takers. There are people who go out and create things, and build things, and work hard on things.

Then there are people who come along with a sword, or a gun, or taxes, or crony capitalism, or Communism, or what have you. There's all these different methods to steal.

Even in nature, there are more parasites than there are non-parasitical organisms. You have a ton of parasites in you, who are living off of you. The better ones are symbiotic, they're giving something back. But there are a lot that are just taking. That's the nature of how any complex system is built.

What I am focused on is true wealth creation. It's not about taking money. It's not about taking something from somebody else. It's from creating abundance.

Obviously, there isn't a finite number of jobs, or finite amount of wealth. Otherwise we would still be sitting around in caves, figuring out how to divide up pieces of fire wood, and the occasional dead deer.

Most of the wealth in civilization, in fact all of it, has been created. It got created from somewhere. It got created from people. It got created from technology. It got created from productivity. It got created from hard work. This idea that it's stolen is this horrible zero-sum game that people who are trying to gain status play.

Everyone can be rich

But the reality is everyone can be rich. We can see that by seeing, that in the First World, everyone is basically richer than almost anyone who was alive 200 years ago.

200 years ago nobody had antibiotics. Nobody had cars. Nobody had electricity. Nobody had the iPhone. All of these things are inventions that have made us wealthier as a species.

Today, I would rather be a poor person in a First World country, than be a rich person in Louis the XIV's France. I'd rather be a poor person today than aristocrat back then. That's because of wealth creation.

The engine of technology is science that is applied for the purpose of creating abundance. So, I think fundamentally everybody can be wealthy.

This thought experiment I want you to think through is imagine if everybody had the knowledge of a good software engineer and a good hardware engineer. If you could go out there, and you could build robots, and computers, and bridges, and program them. Let's say every human knew how to do that.

What do you think society would look like in 20 years? My guess is what would happen is we would build robots, machines, software and hardware to do everything. We would all be living in massive abundance.

We would essentially be retired, in the sense that none of us would have to work for any of the basics. We'd even have robotic nurses. We'd have machine driven hospitals. We'd have self-driving cars. We'd have farms that are 100% automated. We'd have clean energy.

At that point, we could use technology breakthroughs to get everything that we wanted. If anyone is still working at that point, they're working as a form of expressing their creativity. They're working because it's in them to contribute, and to build and design things.

I don't think capitalism is evil. Capitalism is actually good. It's just that it gets hijacked. It gets hijacked by improper pricing of externalities. It gets hijacked by improper yields, where you have corruption, or you have monopolies.

We use credits and debits to cooperate across genetic boundaries

Free markets are intrinsic to the human species

Naval: Overall capitalism [meaning free markets] is intrinsic to the human species. Capitalism is not something we invented. Capitalism is not even something we discovered. It is in us in every exchange that we have.

When you and I exchange information, I want some information back from you. I give you information. You give me information. If we weren't having a good information exchange, you'd go talk to somebody else. So, the notion of exchange, and keeping track of credits and debits, this is built into us as flexible social animals.

We are the only animals in the animal kingdom that cooperate across genetic boundaries. Most animals don't even cooperate. But when they do, they cooperate only in packs where they co-evolve together, and they share blood, so they have some shared interests.

Humans don't have that. I can cooperate with you guys. One of you is a Serbian. The other one is a Persian by origin. And I'm Indian by origin. We have very little blood in common, basically none. But we still cooperate.

What lets us cooperate? It's because we can keep track of debits and credits. Who put in how much work? Who contributed how much? That's all free market capitalism is.

So, I strongly believe that it is innate to the human species, and we are going to create more and more wealth, and abundance for everybody.

Everybody can be wealthy. Everybody can be retired. Everybody can be successful. It is merely a question of education and desire. You have to want it. If you don't want it, that's fine. Then you opt out of the game.

But don't try to put down the people who are playing the game. Because that's the game that keeps you in a comfortable warm bed at night. That's the game that keeps a roof over your head. That's the game that keeps your supermarkets stocked. That's the game that keeps the iPhone buzzing in your pocket.

So, it is a beautiful game that is worth playing ethically, rationally, morally, socially for the human race. It's going to continue to make us all richer and richer, until we have massive wealth creation for anybody who wants it.

Too many takers and not enough makers will plunge a society into ruin

Nivi: It's not just individuals secretly despising wealth, right? There are countries, groups, political parties that overtly despise wealth. Or at least seem to.

Naval: That's right. What those countries, political parties, and groups are reduced to is playing the zero-sum game of status. In the process to destroy wealth creation, they drag everybody down to their level.

Which is why the U.S. is a very popular country for immigrants because of the American dream. Anyone can come here, be poor, and then work really hard and make money, and get wealthy. But even just make some basic money for their life.

Obviously, the definition of wealth is different for different people. A First World citizen's definition of wealth might be, "Oh, I have to make millions of dollars, and I'm completely done."

Whereas to a Third World poor immigrant just entering the country, and we were poor immigrants who came here when I was fairly young, to the United States, wealth may just be a much lower number. It may just be, "I don't have to work a manual labor job for the rest of my life that I don't want to work."

But groups that despise it will essentially bring the entire group to that level. If you get too many takers, and not enough makers, society falls apart. You end up with a communist country.

Look at Venezuela, right? They were so busy taking, and dividing, and reallocating, that people are literally starving in the streets, and losing kilograms of body weight every year just from sheer starvation.

Another way to think about it is imagine an organism that has too many parasites. You need some small number of parasites to stay healthy.

You need a lot of symbiotes. All the mitochondria in all of our cells that help us respire and burn oxygen. These are symbiotes that help us survive. We couldn't survive without them.

But, to me, those are partners in the wealth creation that creates the human body. But if you just were filled with parasites, if you got infected with worms, or a virus, or bacteria that were purely parasitical,

you would die. So, any organism can only withstand a small number of parasites. When the parasitic element gets too far out of control, you die.

Again I'm talking about ethical wealth creation. I'm not talking about monopolies. I'm not talking about crony capitalism. I'm not talking about mispriced externalities like the environment.

I'm talking about free minds, and free markets. Small-scale exchange between humans that's voluntary, and doesn't have an outsized impact on others.

I think that kind of wealth creation, if a society does not respect it, if the group does not respect it, then society will plunge into ruin, and darkness.

Become the kind of person who makes money

Making money isn't about luck

Naval: Obviously, we want to be wealthy, and we want to get there in this lifetime without having to rely on luck.

A lot of people think making money is about luck. It's not. It's about becoming the kind of person that makes money.

I like to think that if I lost all my money and if you drop me on a random street in any English-speaking country, within 5, 10 years I'd be wealthy again. Because it's a skill set that I've developed and I think anyone can develop.

In 1,000 parallel universes, you want to be wealthy in 999 of them. You don't want to be wealthy in the 50 of them where you got lucky. We want to factor luck out of it.

There's four kinds of luck that we're talking about. This came from a book. Marc Andreessen, wrote a blog post about it.

1. Blind luck

The first kind of luck you might say is blind luck. Where I just got lucky because something completely out of my control happened. That's fortune, that's fate.

2. Luck from hustling

Then there's luck that comes through persistence, hard work, hustle, motion. Which is when you're running around creating lots of opportunities, you're generating a lot of energy, you're doing a lot of things, lots of things will get stirred up in the dust.

It's almost like mixing a petri dish and seeing what combines. Or mixing a bunch of reagents and seeing what combines. You're generating enough force and hustle and energy that luck will find you.

We, as a group, you could argue, got together because of that. Nenad had put up these great videos online, I saw them on Twitter. In that sense, he generated his own luck by creating videos until people like me keep finding him.

3. Luck from preparation

A third way is that you become very good at spotting luck. If you are very skilled in a field, you will notice when a lucky break happens in that field. When other people who aren't attuned to it won't notice. So you become sensitive to luck and that's through skill and knowledge and work.

4. Luck from your unique character

Then the last kind of luck is the weirdest, hardest kind. But that's what we want to talk about. Which is where you build a unique character, a unique brand, a unique mindset, where then luck finds you.

For example, let's say that you're the best person in the world at deep sea underwater diving. You're known to take on deep sea underwater dives that nobody else will even attempt to dare.

Then, by sheer luck, somebody finds a sunken treasure ship off the coast. They can't get it. Well, their luck just became your luck, because they're going to come to you to get that treasure. You're going to get paid for it.

Now, that's an extreme example. The person who got lucky by finding the treasure chest, that was blind luck. But them coming to you and asking you to extract it and having to give you half, that's not luck.

You created your own luck. You put yourself in a position to be able to capitalize on that luck. Or to attract that luck when nobody else has created that opportunity for themselves. When we talk about "without getting lucky," we want to be deterministic, we don't want to leave it to chance.

In 1,000 parallel universes, you want to be wealthy in 999 of them

Nivi: Do you want to elaborate a little bit more on the idea that in a 1,000 parallel universes you want to get rich in 999 of them? I think some people are going to see that and say, "that sounds impossible, it sounds like it's too good to be true."

Naval: No, I don't think it's impossible. I think that you may have to work a little bit harder at it given your starting circumstances. I started as a poor kid in India, so if I can make it, anybody can, in that sense.

Now, obviously, I had all my limbs and I had my mental faculties and I did have an education. There are some prerequisites you can't get past. But if you're listening to this video or podcast, you probably have the requisite means at your disposal, which is a functioning body and a functioning mind.

And I've encountered plenty of bad luck along the way. The first little fortune that I made, I instantly lost in the stock market. The second little fortune that I made, or I should have made, I basically got cheated by my business partners. It's only the third time around has been a charm.

And, even then, it has been in a slow and steady struggle. I haven't made money in my life in one giant payout. It's always been a whole bunch of small things piling up. It's more about consistently creating wealth by creating businesses, including opportunities and creating investments. It hasn't been a giant one-off thing.

Wealth stacks up one chip at a time, not all at once

My personal wealth has not been generated by one big year. It stacks up little bit, chips at a time. More options, more businesses, more investments, more things that I can do.

Same way that someone like Nenad, illacertus, he's building his brand online. He's building videos. It's not like any one video is going to suddenly shower him with riches overnight. It's going to be a long lifetime of learning, of reading, of creating that's going to compound.

We're talking about getting wealthy so you can retire, so you have your freedom. Not retire in the sense that you don't do anything. But in the sense that you don't have to be any place you don't want to be, you don't have to do anything you don't want to do, you can wake up when you want, you can sleep when you want, you don't have a boss. That's freedom.

We're talking about enough wealth to get to freedom. Especially thanks to the Internet these days, though, opportunities are massively abundant. I, in fact, have too many ways to make money, I don't have enough time. I have opportunities pouring out of my ears and the thing I keep running out of is time.

There's just so many ways to create wealth, to create products, to create businesses, to create opportunities, and to, as a byproduct, get paid by society that I can't even handle it all.

Build your character in a way that luck becomes deterministic

Nivi: I think it's pretty interesting that the first three kinds of luck that you described there are very common cliches for them that everybody knows. And then for that last kind of luck that comes to you out of the unique way that you act, there's no real cliché for it.

So, for the first three kinds, there's "dumb luck," or "blind luck." That's the first kind of luck. The second kind of luck there's the cliché that "fortune favors the bold." That's a person who gets lucky just by stirring the pot and acting. The third kind of luck, people say that "chance favors the prepared mind."

But for the fourth kind of luck, there isn't a common cliché out there that matches the unique character of your action, which I think is interesting and perhaps an opportunity and it also shows that people aren't necessarily taking advantage of that kind of luck the way they should be.

Naval: I think also at that point, it starts becoming so deterministic that it stops being luck. So, the definition starts fading from luck to more destiny. So, I would characterize that fourth one as you build your character in a certain way and then your character becomes your destiny.

Build your character so opportunity finds you

One of the things I think that is important to making money, when you want the kind of reputation that makes people do deals through you. I use the example of like, if you're a great diver then treasure hunters will come and give you a piece of the treasure for your diving skills.

If you're a trusted, reliable, high-integrity, long-term thinking deal maker, then when other people want to do deals but they don't know how to do them in a trustworthy manner with strangers, they will literally approach you and give you a cut of the deal or offer you a unique deal just because of the integrity and reputation that you have built up.

Warren Buffett, he gets offered deals, and he gets to buy companies, and he gets to buy warrants, and bailout banks and do things that other people can't do because of his reputation.

But of course that's fragile. It has accountability on the line, it has a strong brand on the line, and as we will talk about later, that comes with accountability attached.

But I would say your character, your reputation, these are things that you can build that then will let you take up advantage of opportunities that other people may characterize as lucky but you know that it wasn't luck.

Nivi: You said that this fourth kind of luck is more or less a destiny. There's a quote from that original book that was in Marc's blog posts from Benjamin Disraeli, who I think was the former prime minister of the UK. The quote to describe this kind of luck was, "we make our fortunes and we call them fate."

You have to be a little eccentric to be out on the frontier by yourself

There were a couple other interesting things about this kind of luck that were mentioned in the blog post, I think it'll be good for the listeners to hear about is that, this fourth kind of luck can almost come out of

eccentric ways that you do your things and that eccentricity is not necessarily a bad thing in this case. In fact, it's a good thing.

Naval: Yeah, absolutely. Because the world is a very efficient place, so, everyone has dug through all the obvious places to dig and so to find something that's new and novel and uncovered, it helps to be operating on a frontier.

Where right there you have to be a little eccentric to be out on the frontier by yourself, and then you have to be willing to dig deeper than other people do, deeper than seems rational just because you're interested.

Nivi: Yeah, the two quotes that I've seen that express this kind of luck in addition to that Benjamin Disraeli one, are this one from Sam Altman where he said, "extreme people get extreme results." I think that's pretty nice. And then there's this other one from Jeffrey Pfeffer, who is a professor at Stanford that, "you can't be normal and expect abnormal returns." I've always enjoyed that one too.

Naval: Yeah. And one quote that I like which is the exact opposite of that is, "play stupid games win stupid prizes." A lot of people spend a lot of their time playing social games like on Twitter where you're trying to improve your social standing and you basically win stupid social prizes which are worthless.

Nivi: I guess the last thing that I have from this blog post is the idea that by pursuing these kinds of luck especially the last one, basically everything but dumb luck, by pursuing them you essentially run out of unluck. So, if you just keep stirring the pot and stirring the pot, that alone you will run out of unluck.

Naval: Yeah, or it could just be reversion to the mean. So, then you at least neutralized luck so that it's your own talents that come into play.

You can't earn non-linearly when you're renting out your time

You won't get rich renting out your time

Nivi: Next you go into more specific details on how you can actually get rich, and how you can't get rich. The first point was about how you're not going to get rich: "You are not going to get rich renting out your time. You must own equity, a piece of the business to gain your financial freedom."

Naval: This is probably one of the absolute most important points. People seem to think that you can create wealth, and make money through work. And it's probably not going to work. There are many reasons for that.

But the most basic is just that your inputs are very closely tied to your outputs. In almost any salaried job, even at one that's paying a lot per hour like a lawyer, or a doctor, you're still putting in the hours, and every hour you get paid.

So, what that means is when you're sleeping, you're not earning. When you're retired, you're not earning. When you're on vacation, you're not earning. And you can't earn non-linearly.

If you look at even doctors who get rich, like really rich, it's because they open a business. They open like a private practice. And that private practice builds a brand, and that brand attracts people. Or they build some kind of a medical device, or a procedure, or a process with an intellectual property.

So, essentially you're working for somebody else, and that person is taking on the risk, and has the accountability, and the intellectual property, and the brand. So, they're just not gonna pay you enough. They're gonna pay you the bare minimum that they have to, to get you to do their job. And that can be a high bare minimum, but it's still not gonna be true wealth where you're retired.

Renting out your time means you're essentially replaceable

And then finally you're actually just not even creating that much original for society. Like I said, this tweetstorm should have been called "How to Create Wealth." It's just "How to Get Rich" was a more catchy title. But you're not creating new things for society. You're just doing things over and over.

And you're essentially replaceable because you're now doing a set role. Most set roles can be taught. If they can be taught like in a school, then eventually you're gonna be competing with someone who's got more recent knowledge, who's been taught, and is coming in to replace you.

You're much more likely to be doing a job that can be eventually replaced by a robot, or by an AI. And it doesn't even have to be wholesale replaced over night. It can be replaced a little bit at a time. And that kind of eats into your wealth creation, and therefore your earning capability.

So, fundamentally your inputs are matched to your outputs. You are replaceable, and you're not being creative. I just don't think that, that is a way that you can truly make money.

You must own equity to gain your financial freedom

So everybody who really makes money at some point owns a piece of a product, or a business, or some kind of IP. That can be through stock options, so you can be working at a tech company. That's a fine way to start.

But usually the real wealth is created by starting your own companies, or by even investors. They're in an investment firm, and they're buying equity. These are much more the routes to wealth. It doesn't come through the hours.

You want a career where your inputs don't match your outputs

You really just want a job, or a career, or a profession where your inputs don't match your outputs. If you look at modern society, again this is later in the tweetstorm. Businesses that have high creativity and high leverage tends to be ones where you could do an hour of work, and it can have a huge effect. Or you can do 1,000 hours of work, and it can have no effect.

For example, look at software engineering. One great engineer can for example create bitcoin, and create billions of dollars worth of value. And an engineer who is working on the wrong thing, or not quite as good, or just not as creative, or thoughtful, or whatever, can work for an entire a year, and every piece of code they ship ends up not getting used. Customers don't want it.

That is an example of a profession where the input and the outputs are highly disconnected. It's not based on the number of hours that you put in.

Whereas on the extreme other end, if you're a lumberjack, even the best lumberjack in the world, assuming you're not working with tools, so the inputs and outputs are clearly connected. You're just using an ax, or a saw. You know, the best lumberjack in the world may be like 3x better than one of the worst lumberjacks, right? It's not gonna be a gigantic difference.

So, you want to look for professions and careers where the inputs and outputs are highly disconnected. This is another way of saying that you want to look for things that are leveraged. And by leveraged I don't mean financial leveraged alone, like Wall Street uses, and that has a bad name. I'm just talking about tools. We're using tools.

A computer is a tool that software engineers use. If I'm a lumberjack with bulldozers, and automatic robot axes, and saws, I'm gonna be using tools, and have more leverage than someone who is just using his bare hands, and trying to rip the trees out by the roots.

Tools and leverage are what create this disconnection between inputs and outputs. Creativity, so the higher the creativity component of a profession, the more likely it is to have disconnected inputs and outputs.

So, I think that if you're looking at professions where your inputs and your outputs are highly connected, it's gonna be very, very, hard to create wealth, and make wealth for yourself in that process.

People busy upgrading their lifestyles just can't fathom this freedom

People living below their means have freedom

Nivi: Any other big things you should avoid, other than renting out your time?

Naval: Yeah, there are two tweets that I put out that are related. The first one I was talking about where someone, like, how your lifestyle has to upgrade, shouldn't get upgraded too fast. And that one basically said, people who are living far below their means enjoy a freedom that people busy upgrading their lifestyles just can't fathom.

And I think that's very important, just to not upgrade your lifestyle all the time. To maintain your freedom. And it just gives you freedom of operation. You basically, once you make a little bit of money, you still want to be living like your old self, so that just the worry goes away. So, don't run out to upgrade that house, and lifestyle, and all that stuff.

The most dangerous things are heroin and a monthly salary

Let's say you're getting paid \$1,000 an hour. The problem is, is that when you go into a work lifestyle like that, you don't just suddenly go from making \$20 an hour to making \$1,000 an hour. That's a progression over a long career.

And as that happens, one subtle problem is that you upgrade your lifestyle as you make more, and more money. And that upgrading of the lifestyle kind of ups what you consider to be wealth, and you stay in this wage slave trap.

So, I forget who said it, maybe it was Nassim Taleb. But he said, "The most dangerous things are heroin, and a monthly salary." Right, because they are highly addictive. The way you want to get wealthy is you want to be poor, and working, and working, and working.

Ideally, you'll make your money in discrete lumps

And this is for example how the tech industry works. Where you don't make any money for ten years, and then suddenly at year eleven, you might have a giant payday.

Which is by the way one reason why these very high marginal tax rates for the so-called wealthy are flawed because the highest risk-taking, most creative professions you literally lose money for a decade over your life, while you take massive risk, and you bleed, and bleed, and bleed.

And then suddenly in year eleven, or year fifteen, you might have one single big payday. But then of course Uncle Sam show up, and basically say, "Hey, you know what, you just made a lot money this year. Therefore, you're rich. Therefore, you're evil and you've got to hand it all over to us." So, it just destroys those kinds of creative risk taking professions.

But ideally you want to make your money in discrete lumps, separated over long periods of time, so that your own lifestyle does not have a chance to adapt quickly, and then you basically say, "Okay, now I'm done. Now I'm retired. Now I'm free. I'm still gonna work because you got to do something with your life, but I'm gonna work on only the things that I want, when I want." And so you have much more creative expression, and much less about money.

Society will pay you for creating what it wants and delivering it at scale

Give society what it wants, but doesn't know how to get—at scale

Nivi: You're not gonna get rich renting out your time. But you say that, "you will get rich by giving society what it wants, but does not yet know how to get at scale."

Naval: That's right. So, essentially as we talked about before, money is IOUs from society saying, "You did something good in the past. Now here's something that we owe you for the future." And so society will pay you for creating things that it wants.

But society doesn't yet know how to create those things because if it did, they wouldn't need you. They would already be stamped out big time.

Almost everything that's in your house, in your workplace, and on the street used to be technology at one point in time. There was a time when oil was a technology, that made J.D. Rockefeller rich. There was a time when cars were technology, that made Henry Ford rich.

So, technology is just the set of things, as Alan Kay said, that don't quite work yet [correction: Danny Hillis]. Once something works, it's no longer technology. So, society always wants new things.

Figure out what product you can provide and then figure out how to scale it

And if you want to be wealthy, you want to figure out which one of those things you can provide for society, that it does not yet know how to get, but it will want, that's natural to you, and within your skillset, within your capabilities.

And then you have to figure out how to scale it. Because if you just build one of it, that's not enough. You've got to build thousands, or hundreds of thousands, or millions, or billions of them. So, everybody can have one.

Steve Jobs, and his team of course figured out that society would want smartphones. A computer in their pocket that had all the phone capability times 100, and be easy to use. So, they figured out how to build that, and then they figured out how to scale it.

And they figured out how to get one into every First World citizen's pocket, and eventually every Third World citizen too. And so because of that they're handsomely rewarded, and Apple is the most valuable company in the world.

Nivi: The way I tried to put it was that the entrepreneur's job is to try to bring the high end to the mass market.

Naval: It starts as high end. First it starts as an act of creativity. First you create it just because you want it. You want it, and you know how to build it, and you need it. And so you build it for yourself. Then you figure out how to get it to other people. And then for a little while rich people have it.

Like, for example rich people had chauffeurs, and then they had black town cars. And then Uber came along, and everyone's private driver is available to everybody. And now you can even see Uber pools that are replacing shuttle buses because it's more convenient. And then you get scooters, which are even further down market of that. So, you're right. It's about distributing what rich people used to have to everybody.

But the entrepreneur's job starts even before that, which is creation. Entrepreneurship is essentially an act of creating something new from scratch. Predicting that society will want it, and then figuring out how to scale it, and get it to everybody in a profitable way, in a self-sustaining way.

The Internet allows you to scale any niche obsession

The Internet has massively broadened the possible space of careers

Nivi: Let's look at this next tweet, which I thought was cryptic, and also super interesting, about the kind of job or career that you might have. You said, "The internet has massively broadened the possible space of careers. Most people haven't figured this out yet."

Naval: The fundamental property of the internet more than any other single thing is it connects every human to each other human on the planet. You can now reach everyone.

Whether it's by emailing them personally, whether it's by broadcasting to them on Twitter, whether it's by posting something on Facebook that they find, whether it's by putting up a website they come and access.

It connects everyone to everyone. So, the internet is an inter-networking tool. It connects everybody. That is its superpower. So, you want to use that.

What that helps you figure out is the internet means you can find your audience for your product, or your talent, and skill no matter how far away they are.

For example, Nenad, who is Illacertus, if you look at his videos pre-internet, how would he get the message out there? It would just be ... what would he do? He would run around where he lives in his neighborhood showing it to people on a computer, or a screen? Or he would try to get it played at his local movie theater? It was impossible. It only works because he can put it on the internet.

And then how many people in the world are really interested in it? Or even in interested in what we're talking about are really gonna absorb it, right? It's gonna be a very small subset of humanity. The key is being able to reach them.

The Internet allows you to scale any niche obsession

So, what the internet does is allows any niche obsession, which could be just the weirdest thing. It could be like people who collect snakes, to like people who like to ride hot air balloons, to people who like to sail around the world by themselves, just one person on a craft, or someone who's obsessed with miniature cooking. Like, there's this whole Japanese miniature cooking phenomenon. Or there's a show about a woman who goes in people's houses, and tidies it up, right?

So, whatever niche obsession you have, the internet allows you to scale. Now that's not to say that what you build will be the next Facebook, or reach billions of users, but if you just want to reach 50,000 passionate people like you, there's an audience out there for you.

So the beauty of this is that we have 7 billion human beings on the planet. The combinatorics of human DNA are incredible. Everyone is completely different. You'll never meet any two people who are even vaguely similar to each other, that can substitute for each other.

It's not like you can say, "Well, Nivi, just left my life. So, I can have this other person come in, and he's just like Nivi. And I get the same feelings, and the same responses, and the same ideas." No. There are no substitutes for people. People are completely unique.

So, given that each person has different skillsets, different interests, different obsessions. And it's that diversity that becomes a creative superpower. So, each person can be creatively superb at their own unique thing.

But before that didn't matter. Because if you were living in a little fishing village in Italy, like your fishing village didn't necessarily need your completely unique skill, and you had to conform to just the few jobs that were available. But now today you can be completely unique.

You can go out on the internet, and you can find your audience. And you can build a business, and create a product, and build wealth, and make people happy just uniquely expressing yourself through the internet.

The space of careers has been so broadened. E-sports players, you know, people making millions of dollars playing Fortnite. People creating videos, and uploading them. YouTube broadcasters. Bloggers, podcasters. Joe Rogan, I read, true or false, I don't know, but I read that he's gonna make about \$100 million a year on his podcast. And he's had 2 billion downloads.

Even PewDiePie... there's a hilarious tweet that I retweeted the other day. PewDiePie is the number one trusted name in news. This is a kid I think in Sweden, and he's got three times the distribution of the top cable news networks. Just on his news channel. It's not even on his entertainment channel.

Escape competition through authenticity

The internet enables any niche interest, as long as you're the best at it to scale out. And the great news is because every human is different, everyone is the best at something. Being themselves.

Another tweet I had that is worth kind of weaving in, but didn't go into this tweetstorm, was a very simple one. I like things when I can compress them down because they're easy to remember, and easy to hook onto. But that one was, "Escape competition through authenticity."

Basically, when you're competing with people it's because you're copying them. It's because you're trying to do the same thing. But every human is different. Don't copy.

I know we're mimetic creatures, and René Girard has a whole mimesis theory. But it's much easier than that. Don't imitate. Don't copy. Just do your own thing. No one can compete with you on being you. It's that simple.

And so the more authentic you are to who you are, and what you love to do, the less competition you're gonna have. So, you can escape competition through authenticity when you realize that no one can compete with you on being you. And normally that would have been useless advice pre-internet. Post-internet you can turn that into a career.

All returns in life come from compound interest in long-term games

Play long-term games with long-term people

Nivi: Talk a little bit about what industries you should think about working in. What kind of job you should have? And who you might want to work with? So, you said, "One should pick an industry where you can play long-term games with long-term people." Why?

Naval: Yeah, this is an insight into what makes Silicon Valley work, and what makes high trust societies work. Essentially, all the benefits in life come from compound interests. Whether it's in relationships, or making money, or in learning.

So, compound interest is a marvelous force, where if you start out with 1x what you have, and then if you increase 20% a year for 30 years, it's not that you got 30 years times 20% added on. It was compounding, so it just grew, and grew, and grew until you suddenly got a massive amount of whatever it is. Whether it's goodwill, or love, or relationships, or money. So, I think compound interest is a very important force.

You have to be able to play a long-term game. And long-term games are good not just for compound interest, they're also good for trust. If you look at prisoner's dilemma type games, a solution to prisoner's dilemma is tit-for-tat, which is I'm just going to do to you what you did last time to me, with some forgiveness in case there was a mistake made. But that only works in an iterated prisoner's dilemma, in another words if we play a game multiple times.

So, if you're in a situation, like for example you're in Silicon Valley, where people are doing business with each other, and they know each other, they trust each other. Then they do right by each other because they know this person will be around for the next game.

Now of course that doesn't always work because you can make so much money in one move in Silicon Valley, sometimes people betray each other because they're just like, "I'm going to get rich enough off this that I don't care." So, there can be exceptions to all these circumstances.

But essentially if you want to be successful, you have to work with other people. And you have to figure out who can you trust, and who can you trust over a long, long period of time, that you can just keep playing the game with them, so that compound interest, and high trust will make it easier to play the game, and will let you collect the major rewards, which are usually at the end of the cycle.

So, for example, Warren Buffett has done really well as an investor in the U.S. stock market, but the biggest reason he could do that was because the U.S. stock market has been stable, and around, and didn't get for example seized by the government during a bad administration. Or the U.S. didn't plunge into some war. The underlying platform didn't get destroyed. So, in his case, he was playing a longterm game. And the trust came from the U.S. stock market's stability.

When you switch industries, you're starting over from scratch

In Silicon Valley, the trust comes from the network of people in the small geographic area, that you figure out over time who you can work with, and who you can't.

If you keep switching locations, you keep switching groups... let's say you started out in the woodworking industry, and you built up a network there. And you're working hard, you're trying to build a product in the woodworking industry. And then suddenly another industry comes along that's adjacent but different, but you don't really know anybody in it, and you want to dive in, and make money there.

If you keep hopping from industry to ... "No, actually I need to open a line of electric car stations for electric car refueling." That might make sense. That might be the best opportunity. But every time you reset, every time you wander out of where you built your network, you're going to be starting from scratch. You're not going to know who to trust. They're not going to know to trust you.

There are also industries in which people are transient by definition. They're always coming in and going out. Politics is an example of that, right? In politics new people are being elected. You see in politics that when you have a lot of old-timers, like the Senate, people who have been around for a long time, and they've been career politicians.

There's a lot of downside to career politicians like corruption. But an upside is they actually get deals done with each other because they know the other person is going to be in the same position ten years from now, and they're going to have to keep dealing with them, so they might as well learn how to cooperate.

Whereas every time you get a new incoming freshman class in the House of Representatives, which turns over every two years with a big wave election. Nothing gets done because of a lot fighting. "Because I just got here, I don't know you, I don't know if you're going to be around, why should I work with you rather than just try to do whatever I think is right?"

So, it's important to pick an industry where you can play long-term games, and with long-term people. So, those people have to signal that they're going to be around for a long time. That they're ethical. And their ethics are visible through their actions.

Long-term players make each other rich

Nivi: In a long-term game, it seems that everybody is making each other rich. And in a short-term game, it seems like everybody is making themselves rich.

Naval: I think that is a brilliant formulation. In a longterm game, it's positive sum. We're all baking the pie together. We're trying to make it as big as possible. And in a short term game, we're cutting up the pie.

Now this is not to excuse the socialists, right? The socialists are the people who are not involved in baking the pie, who show up at the end, and say, "I want a slice, or I want the whole pie." They show up with the guns.

But I think a good leader doesn't take credit. A good leader basically tries to inspire people, so the team gets the job done. And then things get divided up according to fairness, and who contributed how much, or as close to it as possible, and took a risk, as opposed to just whoever has the longest knife... the sharpest knife at the end.

Returns come from compound interest in iterated games

Nivi: So, these next two tweets are, “Play iterated games. All returns in life, whether in wealth, relationships, or knowledge come from compound interest.”

Naval: When you have been doing business with somebody, you’ve been friends with somebody for ten years, twenty years, thirty years, it just gets better and better because you trust them so easily. The friction goes down, you can do bigger, and bigger things together.

For example, the simplest one is getting married to someone, and having kids, and raising children. That’s compound interest, right? Investing in those relationships. Those relationships end up being invaluable compared to more casual relationships.

It’s true in health and fitness. You know, the fitter you are, the easier it is to stay fit. Whereas the more you deteriorate your body, the harder it is to come back, and claw your way back to a baseline. It requires heroic acts.

Nivi: Regarding compound interest, I think I saw retweet something a while back. Maybe it was from Ed Latimore. It went something along the lines of, “Get some traction. Get purchase, and don’t lose it” [correction: the tweet is by @mmay3r]. So, the idea was to gain some initial traction, and never fall back, just keep ratcheting up, and up.

Naval: I don’t remember it exactly. But I think that was right. Yes, it was like, “Get traction, and don’t let go.” It was a good one, yes.

You can’t compromise on any of these three

Pick business partners with high intelligence, energy and integrity

Naval: In terms of picking people to work with, pick ones that have high intelligence, high energy, and high integrity, I find that’s the three-part checklist that you cannot compromise on.

You need someone who is smart, or they'll head in the wrong direction. And you're not going to end up in the right place. You need someone high-energy because the world is full of smart, lazy people.

We all know people in our life who are really smart, but can't get out of bed, or lift a finger. And we also know people who are very high energy, but not that smart. So, they work hard, but they're sort of running in the wrong direction.

And smart is not a pejorative. It's not meant to say someone is smart, someone else is stupid. But it's more that everyone is smart at different things. So, depending on what you want to do well, you have to find someone who is smart at that thing.

And then energy, a lot of times people are unmotivated for a specific thing, but they're motivated for other things. So, for example, someone might be really unmotivated to go to a job, and sit in an office. But they might be really motivated to go paint, right?

Well, in that case they should be a painter. They should be putting art up on the internet. Trying to figure out how to build a career out of that, rather than wearing a collar around their neck, and going to a dreary job.

And then high integrity is the most important because otherwise if you've got the other two, what you have is you have a smart and hard working crook, who's eventually going to cheat you. So, you have to figure out if the person is high-integrity.

And as we talked about, the way you do that is through signals. And signals is what they do, not what they say. It's all the non-verbal stuff that they do when they think nobody is looking.

Motivation has to come intrinsically

Nivi: With respect to the energy, there was this interesting thing from Sam Altman a while back, where he was talking about delegation, and he was saying, "One of the important things for delegation is, delegate to people who are actually good at the thing that you want them to do."

It's the most obvious thing, but it seems like... you want to partner with people who are naturally going to do the things that you want them to do.

Naval: Yeah. I almost won't start a company, or hire a person, or work with somebody if I just don't think they're into what I want them to do.

When I was younger, I used to try and talk people into things. I had this idea that you could sell someone into doing something. But you can't. You can't keep them motivated. You can get them inspired initially. It might work if you're a king like Henry V, and you're trying to get them to just charge into battle, and then they'll figure it out.

But if you're trying to keep someone motivated for the long-term, that motivation has to come intrinsically. You can't just create it, nor can you be the crutch for them if they don't have that intrinsic motivation. So, you have to make sure people actually are high-energy, and want to do what you want them to do, and what you want to work with them on.

Integrity is what someone does, despite what they say they do

Reading signals is very, very important. Signals are what people do despite what they say. So, it's important to pay attention to subtle signals. We all know that socially if someone treats a waiter, or waitress in a restaurant really badly, then it's only a matter of time until they treat you badly.

If somebody screws over an enemy, and is vindictive towards them, well it's only a matter of time before they redefine you from friend to enemy, and you feel their wrath. So, angry, outraged, vindictive, short-term thinking people are essentially that way in many interactions in real life.

People are oddly consistent. That's one of the things you learn about them. So, you want to find long-term people. You want to find people who seem irrationally ethical.

For example, I had a friend of mine whose company I invested in, and the company failed, and he could have wiped out all of the investors. But he kept putting more and more personal money in. Through three different pivots he put personal money in until the company finally succeeded. And in the process, he never wiped out the investors.

And I was always grateful to him for that. I said, "Wow, that's amazing that you were so good to your investors. You didn't wipe them out." And he got offended by that. He said, "I didn't do it for you. I didn't

do it for my investors. I did it for me. It's my own self-esteem. It's what I care about. That's how I live my life." That's the kind of person you want to work with.

Another quote that I like, I have a tweet on this. I think I read this somewhere else, so I'm not taking credit for this. But I kind of modified it a little bit. Which is that "self-esteem is the reputation that you have with yourself." You'll always know.

So, good people, moral people, ethical people, easy to work with people, reliable people, tend to have very high self-esteem because they have very good reputations with themselves, and they understand that.

It's not ego. Self-esteem and ego are different things. Because ego can be undeserved, but self-esteem at least you feel like you lived up to your own internal moral code of ethics.

And so it's very hard to work with people who end up being low integrity. And it's hard to figure out who is high integrity and low integrity. Generally, the more someone is saying that they're moral, ethical, and high integrity, the less likely they are to be that way.

It's very much like status signalling. If you overtly bid for status, if you overtly talk about being high status, that is a low status move. If you openly talk about how honest, reliable, and trustworthy you are, you're probably not that honest and trustworthy. That is a characteristic of con men.

So, yeah, pick an industry in which you can play long-term games with long-term people.

Don't partner with cynics and pessimists; their beliefs are self-fulfilling

Don't partner with pessimists

Nivi: Let's do this last tweet. You said, "Don't partner with cynics, and pessimists. Their beliefs are self-fulfilling."

Naval: Yes. Essentially, to create things, you have to be a rational optimist. Rational in the sense that you have to see the world for what it really is. And yet you have to be optimistic about your own capabilities, and your capability to get things done.

We all know people who are consistently pessimistic, who will shoot down everything. Everyone in their life has the helpful critical guy, right? He thinks he's being helpful, but he's actually being critical, and he's a downer on everything.

That person will not only never do anything great in their lives, they'll prevent other people around them from doing something great. They think their job is to shoot holes in things. And it's okay to shoot holes in things as long as you come up with a solution.

There's also the classic military line, "Either lead, follow, or get out of the way." And these people want a fourth option, where they don't want to lead, they don't want to follow, but they don't want to get out of the way. They want to tell you why the thing is not going to work.

And all the really successful people I know have a very strong action bias. They just do things. The easiest way to figure out if something is viable or not is by doing it. At least do the first step, and the second step, and the third, and then decide.

So, if you want to be successful in life, creating wealth, or having good relationships, or being fit, or even being happy, you need to have an action bias towards getting what you want.

Partner with rational optimists

And you have to be optimistic about it. Not irrationally. You know, there's nothing worse than someone who is foolhardy and chasing something that's not worth it.

That's why I say rational optimist. But you have to be rational. Know all the pitfalls. Know the downsides, but still keep your chin up.

You've got one life on this planet. Why not try to build something big? This is the beauty of Elon Musk, and why I think he inspires so many people, it's just because he takes on really, really big audacious tasks. And he provides an example for people to think big.

And it takes a lot of work to build even small things. I don't think the corner grocery store owner is working any less hard than Elon Musk, or pouring any less sweat and toil into it. Maybe even more.

But for whatever reason, education, circumstance, they didn't get the chance to think as big, so the outcome is not as big. So, it's just better to think big. Obviously, rationally, within your means, stay optimistic.

The cynics and the pessimists, what they're really saying, it's unfortunate, but they're basically saying, "I've given up. I don't think I can do anything. And so the world to me just looks like a world where nobody can do anything. And so why should you go do something because if you fail, then I'm right, which is great. But if you succeed, then you just make me look bad."

We descended from pessimists

Nivi: Yes, it's probably better to be an irrational optimist, then it is to be a rational cynic.

Naval: There's a completely rational frame on why you should be an optimist. Historically, if you go back 2,000 years, 5,000 years, 10,000 years, two people are wandering through a jungle, they hear a tiger. One's an optimist, and says, "Oh, it's not headed our way." The other one says, "I'm a pessimist, I'm out of here." And the pessimist runs and survives, and the optimist gets eaten.

So, we're descended from pessimists. We're genetically hardwired to be pessimists. But modern society is far, far safer. There are no tigers wandering around the street. It's very unlikely that you will end up in total ruin, although you should avoid total ruin.

Much more likely that the upside is unlimited, and the downside is limited. So, adapting for modern society means overriding your pessimism, and taking slightly irrationally optimistic bets because the upside is unlimited if you start the next SpaceX, or Tesla, or Uber, you can make billions of dollars of value for society, and for yourself, and change the world.

And if you fail, what's the big deal? You lost a few million dollars of investor money, and they've got plenty more, and that's the bet they take on the chances that you will succeed.

It made sense to be pessimistic in the past. It makes sense to be optimistic today, especially if you're educated and living in a First World country. Even a Third World country. I actually think the economic opportunities in Third World countries are much larger.

The one thing you have to avoid is the risk of ruin. Ruin means stay out of jail. So, don't do anything that's illegal. It's never worth it to wear an orange jumpsuit. And stay out of total catastrophic loss. That could mean that you stay out of things that could be physically dangerous, hurt your body.

You have to watch your health. And stay out of things that can cause you to lose all of your capital, all of your savings. So, don't gamble everything on one go. But take rationally optimistic bets with big upside.

BOCTAOE

Nivi: I think there's people that will try and build up your ideas, and build on your ideas, no matter how far fetched they might seem. And then there are people who list all of the obvious exceptions, no matter how obvious they are.

And fortunately in the startup world, I don't even really get exposed to the people that are giving you the obvious exceptions, and all the reasons it's not going to work. I barely get exposed to that anymore.

Naval: That's what Twitter is for. Scott Adams got so annoyed by this that he came up with a phrase, an acronym, which is "but of course there are obvious exceptions", BOCTAOE. And he used to pin that acronym at the end of his articles for a while.

But Twitter is overrun with nitpickers. Whereas exactly as you were pointing out, Silicon Valley has learned that the upside is so great that you never look down on the kid who's wearing a hoodie and has coffee on his shoes. And just looks like a slob because you don't know if he's going to be the next Mark Zuckerberg, or the next Reid Hoffman.

So, you've got to treat everybody with respect. You've got to look up to every possibility, and opportunity because the upside is so unlimited, and the downside is so limited in the modern world, especially with financial assets and instruments.

Specific knowledge can be found by pursuing your genuine curiosity

Arm yourself with specific knowledge

Nivi: Do you want to talk a little bit about the skills that you need, in particular specific knowledge, accountability, leverage and judgment. So, the first tweet in this area is “Arm yourself with specific knowledge accountability and leverage.” And I’ll throw in judgment as well. I don’t think you covered that in that particular tweet.

Naval: If you want to make money you have to get paid at scale. And why you, that’s accountability, at scale, that’s leverage, and just you getting paid as opposed to somebody else getting paid, that’s specific knowledge.

So, specific knowledge is probably the hardest thing to get across in this whole tweetstorm, and it’s probably the thing that people get the most confused about.

The thing is that we have this idea that everything can be taught, everything can be taught in school. And it’s not true that everything can be taught. In fact, the most interesting things cannot be taught. But everything can be learned. And very often that learning either comes from some innate characteristics in your DNA, or it could be through your childhood where you learn soft skills which are very, very hard to teach later on in life, or it’s something that is brand new so nobody else knows how to do it either, or it’s true on the job training because you’re pattern matching into highly complex environments, basically building judgment in a specific domain.

Classic example is investing, but it could be in anything. It could be in judgment in running a fleet of trucks, it could be judgment in weather forecasting.

So, specific knowledge is the knowledge that you care about. Especially if you’re later in life, let’s say your post 20, 21, 22, you almost don’t get to choose which specific knowledge you have. Rather, you get to look at what you have already built by that point in time, and then you can build on top of it.

Specific knowledge can’t be trained

The first thing to notice about specific knowledge is that you can’t be trained for it. If you can be trained for it, if you can go to a class and learn specific knowledge, then somebody else can be trained for it too,

and then we can mass-produce and mass-train people. Heck, we can even program computers to do it and eventually we can program robots to walk around doing it.

So, if that's the case, then you're extremely replaceable and all we have to pay you is the minimum wage that we have to pay you to get you to do it when there are lots of other takers who can be trained to do it. So really, your returns just devolve into your cost of training plus the return on investment on that training.

So, you really want to pick up specific knowledge, you need your schooling, you need your training to be able to capitalize on the best specific knowledge, but the part of it that you're going to get paid for is the specific knowledge.

Specific knowledge is found by pursuing your curiosity

For example, someone who goes and gets a degree in psychology and then becomes a salesperson. Well if they were already a formidable salesperson, a high grade salesmanship to begin with, then the psychology degree is leverage, it arms them and they do much better at sales.

But if they were always an introvert never very good at sales and they're trying to use psychology to learn sales, they're just not going to get that great at it.

So, specific knowledge is found much more by pursuing your innate talents, your genuine curiosity, and your passion. It's not by going to school for whatever is the hottest job, it's not for going into whatever field investors say is the hottest.

Very often specific knowledge is at the edge of knowledge. It's also stuff that's just being figured out or is really hard to figure out.

So, if you're not 100% into it somebody else who is 100% into it will outperform you. And they won't just outperform you by a little bit, they'll outperform you by a lot because now we're operating the domain of ideas, compound interest really applies and leverage really applies.

So, if you're operating with 1,000 times leverage and somebody is right 80% of the time, and somebody else is right 90% of time, the person who's right 90% of the time will literally get paid hundreds of times

more by the market because of the leverage and because of the compounding factors and being correct. So, you really want to make sure you're good at it so that genuine curiosity is very important.

Building specific knowledge will feel like play to you

So, very often, it's not something you sit down and then you reason about, it's more found by observation. You almost have to look back on your own life and see what you're actually good at.

For example, I wanted to be a scientist and that is where a lot of my moral hierarchy comes from. I view scientists sort of at the top of the production chain for humanity. And the group of scientists who have made real breakthroughs and contributions that probably added more to human society, I think, than any single other class of human beings.

Not to take away anything from art or politics or engineering or business, but without the science we'd still be scrambling in the dirt fighting with sticks and trying to start fires.

My whole value system was built around scientists and I wanted to be a great scientist. But when I actually look back at what I was uniquely good at and what I ended up spending my time doing, it was more around making money, tinkering with technology, and selling people on things. Explaining things, talking to people.

So, I have some sales skills, which is a form specific knowledge that I have. I have some analytical skills around how to make money. And I have this ability to absorb data, obsess about it, and break it down and that is a specific skill that I have. I also just love tinkering with technology. And all of this stuff feels like play to me, but it looks like work to others.

So, there are other people to whom these things would be hard and they say like, "Well, how do I get good at being pithy and selling ideas?" Well, if you're not already good at it or if you're not really into it, maybe it's not your thing, focus on the thing that you are really into.

This is ironic, but the first person to actually point out my real specific knowledge was my mother. She did it as an aside, talking from the kitchen and she said it when I was like 15 or 16 years old. I was telling a friend of mine that I want to be an astrophysicist and she said, "No, you're going to go into business."

I was like, “What, my mom’s telling me I’m going to be in business. I’m going to be an astrophysicist. Mom doesn’t know she’s talking about.” But mom knew exactly what she was talking about.

She’d already observed that every time we walk down the street, I would critique the local pizza parlor on why they were selling their slices a certain way with certain toppings and why their process of ordering was this way when it should have been that way.

So, she knew that I had more of a business curious mind, but then my obsession with science combined to create technology and technology businesses where I found myself.

So, very often, your specific knowledge is observed and often observed by other people who know you well and revealed in situations rather than something that you come up with.

Specific knowledge is on the bleeding edge of technology, art and communication

Specific knowledge can be taught through apprenticeships

Naval: To the extent that specific knowledge is taught, it’s on the job. It’s through apprenticeships. And that’s why the best businesses, the best careers are the apprenticeship or self-taught careers, because those are things society still has not figured out how to train and automate yet.

The classic line here is that Warren Buffett went to Benjamin Graham when he got out of school. Benjamin Graham was the author of the Intelligent Investor and sort of modernized or created value investing as a discipline. And Warren Buffett went to Benjamin Graham and offered to work for him for free.

And Graham said, “Actually, you’re overpriced, free is overpriced.” And Graham was absolutely right. When it comes to a very valuable apprenticeship like the type that Graham was going to give Buffet, Buffet should have been paying him a lot of money. That right there tells you that those are skills worth having.

Specific knowledge is often highly creative or technical

Specific knowledge also tends to be technical and creative. It's on the bleeding edge of technology, on the bleeding edge of art, on the bleeding edge of communication.

Even today, for example, there are probably meme lords out there on the Internet who can create incredible memes that will spread the idea to millions of people. Or are very persuasive – Scott Adams is a good example of this. He is essentially becoming one of the most credible people in the world by making accurate predictions through persuasive arguments and videos.

And that is specific knowledge that he has built up over the years because he got obsessed with hypnosis when he was young, he learned how to communicate through cartooning, he embraced Periscope early, so he's been practicing lots of conversation, he's read all the books on the topic, he's employed it in his everyday life. If you look at his girlfriend, she's this beautiful young Instagram model.

That is an example of someone who has built up a specific knowledge over the course of his career. It's highly creative, it has elements of being technical in it, and it's something that is never going to be automated.

No one's going to take that away from him, because he's also accountable under one brand as Scott Adams, and he's operating with the leverage of media with Periscope and drawing Dilbert cartoons and writing books. He has massive leverage on top of that brand and he can build wealth out of it if he wanted to build additional wealth beyond what he already has.

Specific knowledge is specific to the individual and situation

Nivi: Should we be calling it unique knowledge or does specific knowledge somehow make more sense for it?

Naval: You know, I came up with this framework when I was really young. We're talking decades and decades. It's now probably over 30 years old. So, at the time specific knowledge stuck with me so that is how I think about it.

The reason I didn't try and change it is because every other term that I found for it was overloaded in a different way. At least specific knowledge isn't that used. I can kind of rebrand it.

The problem with unique knowledge is, yeah, maybe it's unique but if I learn it from somebody else it's no longer unique, then we both know it. So, it's not so much that it is unique, it's that it is highly specific to the situation, it's specific to the individual, it's specific to the problem, and it can only be built as part of a larger obsession, interest, and time spent in that domain.

It can't just be read straight out of a single book, nor can it be taught in a single course, nor can it be programmed into a single algorithm.

You can't be too deliberate about assembling specific knowledge

Nivi: Speaking of Scott Adams, he's got a blog post on how to build your career by getting in, say, the top 25 percentile at three or more things. And by doing that, you become the only person in the world who can do those three things in the 25th percentile.

So, instead of trying to be the best at one thing, you just try to be very, very good at three or more things. Is that a way of building specific knowledge?

Naval: I actually think the best way is just to follow your own obsession. And somewhere in the back of your mind, you can realize that, actually, this obsession I like and I'll keep an eye out for the commercial aspects of it.

But I think if you go around trying to build it a little too deliberately, if you become too goal-oriented on the money, then you won't pick the right thing. You won't actually pick the thing that you love to do, so you won't go deep enough into it.

Scott Adams' observation is a good one, predicated on statistics. Let's say there's 10,000 areas that are valuable to the human race today in terms of knowledge to have, and the number one in those 10,000 slots is taken.

Someone else is likely to be the number one in each of those 10,000, unless you happen to be one of the 10,000 most obsessed people in the world that at a given thing.

But when you start combining, well, number 3,728 with top-notch sales skills and really good writing skills and someone who understands accounting and finance really well, when the need for that intersection

arrives, you've expanded enough from 10,000 through combinatorics to millions or tens of millions. So, it just becomes much less competitive.

Also, there's diminishing returns. So, it's much easier to be top 5 percentile at three or four things than it is to be literally the number one at something.

Build specific knowledge where you are a natural

I think it's a very pragmatic approach. But I think it's important that one not start assembling things too deliberately because you do want to pick things where you are a natural. Everyone is a natural at something.

We're all familiar with that phrase, a natural. "Oh, this person is a natural at meeting men or women, this person is a natural socialite, this person is a natural programmer, this person is a natural reader." So, whatever you are a natural at, you want to double down on that.

And then there are probably multiple things you're natural at because personalities and humans are very complex. So, we want to be able to take the things that you are natural at and combine them so that you automatically, just through sheer interest and enjoyment, end up top 25% or top 10% or top 5% at a number of things.

If you can do both, you will be unstoppable

Learn to sell, learn to build

Nivi: Talking about combining skills, you said that you should "learn to sell, learn to build, if you can do both, you will be unstoppable."

Naval: This is a very broad category. It's two broad categories. One is building the product. Which is hard, and it's multivariate. It can include design, it can include development, it can include manufacturing, logistics, procurement, it can even be designing and operating a service. It has many, many definitions.

But in every industry, there is a definition of the builder. In our tech industry it's the CTO, it's the programmer, it's the software engineer, hardware engineer. But even in the laundry business, it could be the person who's building the laundry service, who is making the trains run on time, who's making sure all the clothes end up in the right place at the right time, and so on.

The other side of it is sales. Again, selling has a very broad definition. Selling doesn't necessarily just mean selling individual customers, but it can mean marketing, it can mean communicating, it can mean recruiting, it can mean raising money, it can mean inspiring people, it could mean doing PR. It's a broad umbrella category.

The Silicon Valley model is a builder and seller

So, generally, the Silicon Valley startup model tends to work best. It's not the only way, but it is probably the most common way, when you have two founders, one of whom is world class at selling, and one of whom is world class at building.

Examples are, of course, Steve Jobs and Steve Wozniak with Apple, Gates and Allen probably had similar responsibilities early on with Microsoft, Larry and Sergey probably broke down along those lines, although it's a little different there because that was a very technical product delivered to end users through a simple interface.

But generally, you will see this pattern repeated over and over. There's a builder and there's a seller. There's a CEO and CTO combo. And venture and technology investors are almost trained to look for this combo whenever possible. It's the magic combination.

If you can do both you will be unstoppable

The ultimate is when one individual can do both. That's when you get true superpowers. That's when you get people who can create entire industries.

The living example is Elon Musk. He may not necessarily be building the rockets himself, but he understands enough that he actually makes technical contributions. He understands the technology well enough that no one's going to snow him on it, and he's not running around making claims that he doesn't think he can't eventually deliver. He may be optimistic on the timelines but he thinks this is within reasonableness for delivery.

Even Steve Jobs developed enough product skills and was involved enough in the product that he also operated in both of these domains. Larry Ellison started as a programmer and I think wrote the first version of Oracle, or was actually heavily involved in it.

Marc Andreessen was also in this domain. He may not have had enough confidence in his sales skills, but he was the programmer who wrote Netscape Navigator, or a big chunk of it. So, I think the real giants in any field are the people who can both build and sell.

I'd rather teach an engineer marketing than a marketer engineering

And usually the building is a thing that a sales person can't pick up later in life. It requires too much focused time. But a builder can pick up selling a little bit later, especially if they were already innately wired to be a good communicator. Bill Gates famously paraphrases this as, "I'd rather teach an engineer marketing, than a marketer engineering."

I think if you start out with a building mentality and you have building skills and it's still early enough in your life, or you have enough focused time that you think you can learn selling, and you have some natural characteristics or you're a good salesperson, then you can double down on those.

Now, your sales skills could be in a different than traditional domain. For example, let's say you're a really good engineer and then people are saying, well, now you need to be good at sales, well, you may not be good at hand-to-hand sales, but you may be a really good writer.

And writing is a skill that can be learned much more easily than, say, in-person selling, and so you may just cultivate writing skills until you become a good online communicator and then use that for your sales.

On the other hand, it could just be that you're a good builder and you're bad at writing and you don't like communicating to mass audiences but you're good one-on-one, so then you might use your sales skills for recruiting or for fundraising, which are more one-on-one kinds of endeavors.

This is pointing out that if you're at the intersection of these two, don't despair because you're not going to be the best technologist and you're not going to be the best salesperson, but in a weird way, that combination, back to the Scott Adams skill stack, that combination of two skills is unstoppable.

Long term, people who understand the underlying product and how to build it and can sell it, these are catnip to investors, these people can break down walls if they have enough energy, and they can get almost anything done.

Nivi: If you could only pick one to be good at, which one would you pick?

Naval: When you're trying to stand out from the noise building is actually better because there're so many hustlers and sales people who have nothing to back them up. When you're starting out, when you're trying to be recognized, building is better.

But much later down the line building gets exhausting because it is a focus job and it's hard to stay current because there's always new people, new products coming up who have newer tools, and frankly more time because it's very intense, it's a very focused task.

So, sales skills actually scale better over time. Like for example, if you have a reputation for building a great product, that's good, but when you ship your new product, I'm going to validate it based on the product. But if you have a reputation for being a good person to do business with and you're persuasive and communicative then that reputation almost becomes self-fulfilling.

So, I think if you only had to pick up one, you can start with building and then transition to selling. This is a cop-out answer, but I think that is actually the right answer.

You should be able to pick up any book in the library and read it

Read what you love until you love to read

Nivi: Before we go and talk about accountability and leverage and judgment, you've got a few tweets further down the line that I would put in the category of continuous learning.

They're essentially, "there is no skill called business. Avoid business magazines and business class, study microeconomics, game theory, psychology, persuasion, ethics, mathematics and computers."

There's one other comment that you made in a Periscope that was, "you should be able to pick up any book in the library and read it." And the last tweet in this category was, "reading is faster than listening, doing is faster than watching."

Naval: Yeah, the most important tweet on this, I don't even have in here unfortunately, which is, the foundation of learning is reading. I don't know a smart person who doesn't read and read all the time.

And the problem is, what do I read? How do I read? Because for most people it's a struggle, it's a chore. So, the most important thing is just to learn how to educate yourself and the way to educate yourself is to develop a love for reading.

So, the tweet that is left out, the one that I was hinting at is, "read what you love until you love to read." It's that simple.

Everybody I know who reads a lot loves to read, and they love to read because they read books that they loved. It's a little bit of a catch-22, but you basically want to start off just reading wherever you are and then keep building up from there until reading becomes a habit. And then eventually, you will just get bored of the simple stuff.

So you may start off reading fiction, then you might graduate to science fiction, then you may graduate to non-fiction, then you may graduate to science, or philosophy, or mathematics or whatever it is, but take your natural path and just read the things that interest you until you kind of understand them. And then you'll naturally move to the next thing and the next thing and the next thing.

Read the original scientific books in a field

Now, there is an exception to this, which is where I was hinting with what things you actually do want to learn, which is, at some point there's too much out there to read. Even reading is full of junk.

There are actually things you can read, especially early on, that will program your brain a certain way, and then later things that you read, you will decide whether those things are true or false based on the earlier things.

So, it is important that you read foundational things. And foundational things, I would say, are the original books in a given field that are very scientific in their nature.

For example, instead of reading a business book, pick up Adam Smith's *The Wealth of Nations*. Instead of reading a book on biology or evolution that's written today, I would pick up Darwin's *Origin of the Species*. Instead of reading a book on biotech right now that may be very advanced, I would just pick up *The Eighth Day of Creation* by Watson and Crick. Instead of reading advanced books on what cosmology and what Neil Degraesse Tyson and Stephen Hawking have been saying, you can pick up Richard Feynman's *Six Easy Pieces* and start with basic physics.

Don't fear any book

If you understand the basics, especially in mathematics and physics and sciences, then you will not be afraid of any book. All of us have that memory of when we were sitting in class and we're learning mathematics, and it was all logical and all made sense until at one point the class moved too fast and we fell behind.

Then after that we were left memorizing equations, memorizing concepts without being able to derive them from first principles. And at that moment, we're lost, because unless you're a professional mathematician, you're not going to remember those things. All you're going to remember are the techniques, the foundations.

So, you have to make sure that you're building on a steel frame of understanding because you're putting together a foundation for skyscraper, and you're not just memorizing things because you're just memorizing things you're lost. So the foundations are ultra important.

And the ultimate, the ultimate is when you walk into a library and you look at it up and down and you don't fear any book. You know that you can take any book off the shelf, you can read it, you can understand it, you can absorb what is true, you can reject what is false, and you have a basis for even working that out that is logical and scientific and not purely just based on opinions.

The means of learning are abundant; the desire to learn is scarce

The beauty of the internet is the entire library of Alexandria times 10 is at your fingertips at all times. It's not the means of education or the means of learning are scarce, the means of learning are abundant. It's the desire to learn that's scarce. So, you really have to cultivate the desire.

And it's not even cultivating you've to not lose it. Children have a natural curiosity. If you go to a young child who's first learning language, they're pretty much always asking: What's this? What's that? Why is this? Who's that? They're always asking questions.

But one of the problems is that schools and our educational system, and even our way of raising children replaces curiosity with compliance. And once you replace the curiosity with the compliance, you get an obedient factory worker, but you no longer get a creative thinker. And you need creativity, you need the ability to feed your own brain to learn whatever you want.

Mathematics and logic are the basis for understanding everything else

The ultimate foundations are math and logic

Naval: Foundational things are principles, they're algorithms, they're deep seated logical understanding where you can defend it or attack it from any angle. And that's why microeconomics is important because macroeconomics is a lot of memorization, a lot of macro bullshit.

As Nassim Taleb says, it is easier to macro bullshit than it is the micro bullshit. Because macroeconomics is voodoo-complex-science meets politics. You can't find two macroeconomists to agree on anything these days, and different macroeconomists get used by different politicians to peddle their different pet theories.

There are even macroeconomists out there now peddling something called Modern Monetary Theory which basically says, hey, except for this pesky thing called inflation, we can just print all the money that we want. Yes, except for this pesky thing called inflation. That's like saying, except for limited energy, we can fire rockets off into space all day long.

It's just nonsense, but the fact that there are people who have "macroeconomist" in their title and are peddling Modern Monetary Theory just tells you that macroeconomics as a so-called science has been corrupted. It's now a branch of politics.

So, you really want to focus on the foundations. The ultimate foundation are mathematics and logic. If you understand logic and mathematics, then you have the basis for understanding the scientific method. Once you understand the scientific method, then you can understand how to separate truth from falsehood in other fields and other things that you're reading.

It's better to read a great book slowly than to fly through a hundred books quickly

So, be very careful about reading other people's opinions and even be careful when reading facts because so-called facts are often just opinions with a veneer [of pseudoscience] around them.

What you are really looking for are algorithms. What you are really looking for is understanding. It's better to go through a book really slowly and struggle and stumble and rewind, than it is to fly through it quickly and say, "Well, now I've read 20 books, I've read 30 books, I've read 50 books in the field."

It's like Bruce Lee said, "I don't fear the man who knows a thousand kicks and a thousand punches, I fear the man who's practiced one punch ten thousand times or one kick ten thousand times." It's that understanding that comes through repetition and through usage and through logic and foundations that really makes you a smart thinker.

Learn persuasion and programming

Nivi: To lay a foundation for learning for the rest of your life I think you need two things, if I was going to try and sum it up. One, practical persuasion and two, you need to go deep in some technical category, whether it's abstract math, or you want to read Donald Knuth's books on algorithms, or you want to read Feynman's lectures on physics.

If you have practical persuasion and a deep understanding of some complex topic, I think you'll have a great foundation for learning for the rest of your life.

Naval: Yeah. In fact let me expand that a little bit. I would say that the five most important skills are of course, reading, writing, arithmetic, and then as you're adding in, persuasion, which is talking. And then finally, I would add computer programming just because it's an applied form of arithmetic that just gets you so much leverage for free in any domain that you operate in.

If you're good with computers, if you're good at basic mathematics, if you're good at writing, if you're good at speaking, and if you like reading, you're set for life.

Avoid business schools and magazines

There's no actual skill called 'business'

Naval: In that sense, business to me is bottom of the barrel. There's no actual skill called business, it's too generic. It's like a skill called "relating." Like "relating to humans." That's not a skill, it's too broad.

A lot of what goes on in business schools, and there is some very intelligent stuff taught in business schools – I don't mean to detract from them completely – some of the things taught in business school are just anecdotes. They call them "case studies."

But they're just anecdotes, and they're trying to help you pattern match by throwing lots of data points at you, but the reality is, you will never understand them fully until you're actually in that position yourself.

Even then you will find that basic concepts from game theory, psychology, ethics, mathematics, computers, and logic will serve you much, much better.

I would focus on the foundations, I would focus with a science bent. I would develop a love for reading, including by reading so-called junk food that you're not supposed to read. You don't have to read the classics. That [reading] is the foundation for your self-education.

Doing is faster than watching

Nivi: What did you mean when you said that "doing is faster than watching?"

Naval: When it comes to your learning curve, if you want to optimize your learning curve... One of the reasons why I don't love podcasts, even though I'm a generator of podcasts, is that I like to consume my information very quickly.

And I'm a good reader, or a fast reader and I can read very fast but I can only listen at a certain speed. I know people listen at 2x, 3x, but everyone sounds like a chipmunk and it's hard to go back, it's hard to highlight, it's hard to pinpoint snippets and save them in your notebook, and so on.

Similarly, a lot of people think they can become really skilled at something by watching others do it, or even by reading about others doing it. And going back to the business school case study, that's a classic example.

They study other people's businesses, but in reality, you're going to learn a lot more about running a business by operating your own lemonade stand or equivalent. Or even opening a little retail store down the street.

That is how you're going to learn on the job because a lot of the subtleties don't express themselves until you're actually in the business.

For example, everyone's into mental models these days. You go to Farnam Street, you go to Poor Charlie's Almanack, and you can learn all the different mental models. But which ones matter more? Which ones do you apply more often? Which ones matter in which circumstances? That's actually the hard part.

For example, my personal learning has been that the principal-agent problem drives so much in this world. It's an incentives problem. I've learned that tit-for-tat iterated prisoner's dilemma is the piece of game theory that is worth knowing the most. You can almost put down the game theory book after that.

By the way, the best way to learn game theory is to play lots of games. I never even read game theory books. I consider myself extremely good at game theory. I've never opened up a game theory book and found a result in there where I didn't think, "Oh, yeah, that's common sense to me."

The reason is that I grew up playing all kinds of games and I ran into all kinds of corner cases with all kinds of friends, and so it's just second nature to me. You can always learn better by doing it on the job.

The number of 'doing' iterations drives the learning curve

But doing is a subtle thing. Doing encapsulates a lot. For example, let's say, I want to learn how to run a business. Well, if I start a business where I go in every day and I'm doing the same thing, let's say I'm running a retail store down the street where I'm stocking the shelves with food and liquor every single day, I'm not going to learn that much because I'm repeating things a lot.

So, I'm putting in thousands of hours, but they are thousands of hours doing the same thing. Whereas if I was putting in thousands of iterations, that would be different. So, the learning curve is across iterations [not iterations].

So if I was trying new marketing experiments in the store all the time, I was constantly changing up the inventory, I was constantly changing up the branding and the messaging, I was constantly changing the sign, I was constantly changing the online channels that are used to drive foot traffic in, I was experimenting with being open at different hours, I had the ability to walk around and talk to other store owners and getting their books and figure out how they run their businesses.

It's the number of iterations that drives the learning curve. So, the more iterations you can have, the more shots on goal you can have, the faster you're going to learn. It's not just about the hours put in.

If you're willing to bleed a little every day, you may win big later

It's actually a combination of the two, but I think just the way we're built and the way that the world presents itself, the world offers us very easily the opportunity to do the same thing over and over and over again. But really, we'd be better served if we went off and found ways to do new things from scratch.

And doing something new the first time is painful, because you're wandering into uncertain territory and high odds are that you will fail. So you just have to get very, very comfortable with frequent small failures.

Nassim Taleb talks about this also. He made his fortune, his wealth by being a trader who basically relied upon black swans. Nassim Taleb made money by losing little bits of money every day and then once in a blue moon he would make a lot of money when the unthinkable happened for other people.

Whereas most people want to make little bits of money every day and in exchange they'll tolerate lots of blow-up risk, they'll tolerate going completely bankrupt.

We're not evolved to bleed a little bit every day. If you're out in the natural environment, and you get a cut and you're literally bleeding a little bit every day, you will eventually die. You'll have to stop that cut.

We're evolved for small victories all the time but that becomes very expensive. That's where the crowd is. That's where the herd is. So, if you're willing to bleed a little bit every day but in exchange you'll win big later, you will do better.

That is, by the way, entrepreneurship. Entrepreneurs bleed every day.

They're not making money, they're losing money, they're constantly stressed out, all the responsibility is upon them, but when they win they win big. On average they'll make more.

Take risks under your own name and society will reward you with leverage

You need accountability to get leverage

Nivi: Why don't we jump into accountability, which I thought was pretty interesting and I think you have your own unique take on it. So the first tweet on accountability was, "Embrace accountability and take business risks under your own name. Society will reward you with responsibility, equity, and leverage."

Naval: Yeah. So to get rich, you're going to need leverage. Leverage comes in labor, comes in capital, or it can come through code or media. But most of these, like labor and capital, people have to give to you. For labor, somebody has to follow you. For capital, somebody has to give you money or assets to manage or machines.

So to get these things, you have to build up credibility and you have to do those under your own name as much as possible, which is risky. So accountability is a double-edged thing. It allows you to take credit when things go well and to bear the brunt of the failure when things go badly.

Take business risks under your own name

So in that sense, people who are stamping their names on things aren't foolish. They're just confident. Maybe it turns out to be foolish in the end, but if you look at a Kanye or an Oprah or a Trump or an Elon

or anyone like that, these people can get rich just off their name because their name is such powerful branding.

Regardless of what you think of Trump, you have to realize that the guy was among the best in the world at just branding his name. Why would you go to Trump Casino? Used to be because Trump. Why would you go to a Trump tower? Because of Trump.

When it came time to vote, I think that a lot of voters just went in and said, "Trump." They recognize the name, so the name recognition paid off.

Same thing with Oprah. She puts her brand on something, her name on something and it flies off the shelves, and it's like an instant validator.

These people also take risks for putting their name out there. Obviously Trump is now probably hated by half or more than half of the country and by a big chunk of the world as he sticks his name out there.

By putting your name out there, you become a celebrity, and fame has many, many downsides. It's better to be anonymous and rich than to be poor and famous, but even famous and rich has a lot of downsides associated with it. You're always in the public eye.

A well-functioning team has clear accountability for each position

Accountability is quite important, and when you're working to build a product or you're working in a team or you're working in a business, we constantly have drummed into our heads how important it is to be part of a team. Absolutely agree with that.

A lot of our training socially is telling us to not stick our necks out of the crowd. There's a saying that I hear from our Australian friends that the tall poppy gets cut. Don't stick your neck out, but I would say that actually a really, really well-functioning team is small and has clear accountability for each of the different portions.

You can say, "Okay, this person's responsible for building the product. This person's responsible for the messaging. This person's responsible for raising money. This person's responsible for the pricing strategy

and maybe the online advertising.” So if somebody screws up, you know exactly who’s responsible. While at the same time if something goes really well, you also know exactly who’s responsible.

If you have a small team and you have clearly delineated responsibilities, then you can still keep a very high level of accountability. Accountability is really important because when something succeeds or fails, if it fails, everybody points fingers at each other, and if it succeeds, everybody steps forward to take credit.

We’ve all had that experience when we were in school and we got a group assignment to do. There were probably a few people in there who did a lot of the work. Then there are a few people who just did a lot of grandstanding or positioning to do the work. We’re all familiar with this from a childhood sense, but it’s sort of uncomfortable to talk about.

People who can fail in public have a lot of power

Clear accountability is important. Without accountability, you don’t have incentives. Without accountability, you can’t build credibility. But you take risk. You take risk of failure. You take risk of humiliation. You take risk of failure under your own name.

Luckily in modern society, there’s no more debtors’ prison and people don’t go to jail or get executed for losing other people’s money, but we’re still socially hard wired to not fail in public under our own names. The people who have the ability to fail in public under their own names actually gain a lot of power .

For example, I’ll give a personal anecdote. Up until about 2013, 2014, my public persona was an entirely around startups and investing. Only around 2014, 2015 did I start talking about philosophy and psychological things and broader things.

It made me a little nervous because I was doing it under my own name. There were definitely people in the industry who sent me messages through the back channel like, “What are you doing? You’re ending your career. This is stupid.”

I kind of just went with it. I took a risk. Same with crypto. Early on, I took a risk.

But when you put your name out there, you take a risk with certain things. You also get to reap the rewards. You get the benefits.

If you have high accountability, you're less replaceable

Accountability is how you're going to get equity

Naval: Accountability is important because that's how you're going to get leverage. That's how you're going to get credibility. It's also how you're going to get equity. You're going to get a piece of the business.

When you're negotiating with other people, ultimately if someone else is making a decision about how to compensate you, that decision will be based on how replaceable you are. If you have high accountability, that makes you less replaceable. Then they have to give you equity, which is a piece of the upside.

Taking accountability is like taking equity in all your work

Equity itself is a good example because equity is also a risk-based instrument. Equity means you get paid everything after all the people who need guaranteed money are paid back.

If you look at the hierarchy of capital in a company, the employees get paid first. They get paid the salary first. In legal [bankruptcy] proceedings, the salaries are sacrosanct. If you're a board member and the company spends too much money and has back salaries to pay, the government can go after you personally to pay back the salaries. The employees get the most security, but in exchange for that security, they don't have as much upside.

Next in line would be the debt holders who are maybe the bankers who lend money to the company for operations and they need to make their fixed coupon every month or every year, but they don't get much more upside beyond that. They might be making 5, 10, 15, 20, 25% a year, but that's what their upside is limited to.

Finally there are the equity holders. These people are actually going to get most of the upside. Once the debt holders are paid off and the salaries are paid off, whatever remains goes to them.

But if there isn't enough money to pay off the salaries and the debt holders, or if there's just barely enough to pay off the salary and the debt holders, which is what happens with most businesses, most of the times, the equity holders get nothing.

The equity holders take on greater risk, but in exchange, they get nearly unlimited upside. You can do the same with all of your work. Essentially, taking accountability for your actions is the same as taking an equity position in all of your work. You're taking greater downside risk for greater upside.

Realize that in modern society, the downside risk is not that large. Even personal bankruptcy can wipe the debts clean in good ecosystems. I'm most familiar with Silicon Valley, but generally people will forgive failures as long as you were honest and made a high integrity effort.

There's not really that much to fear in terms of failure, and so people should be taking on a lot more accountability than they actually are.

Nivi: Is accountability actually fragile or do you really just mean that we're hardwired not to fail in public, so it just feels like it's a fragile thing?

Naval: I think it could actually be fragile. An example of accountability is you're an airplane pilot. As a captain, you're taking on accountability for the entire plane.

Let's say that something goes wrong with the aircraft. You can't later blame it on anyone else. You can't blame it on the steward or the stewardess. You can't blame it on the copilot. You're the captain. You're responsible for the ship. If you screw up, you crash the ship, and there are immediate consequences.

In the old days, the captain was expected to go down with the ship. If the ship was sinking, then literally the last person who got to get off was the captain. I think accountability does come with real risks, but we're talking about a business context.

The risk here would be that you would probably be the last one to get your capital back out. You'd be the last one to get paid for your time. The time that you've put in, the capital that you've put into the company, these are what are at risk.

Even if a business fails and your name's on it, that's not as bad as if it turns out to be an integrity issue. Bernie Madoff, for example, Madoff investments, that name is never going to be good again in the investment community. You could be Bernie Madoff's great-great-grandson. You are not going to go into the investment business because he ruined the family name.

I think these days the accountability risk with a name happens more around integrity, rather than it does around purely economic failure.

Accountability is reputational skin in the game

Nivi: The big takeaway for me on accountability is that you will be rewarded directly in proportion with your accountability. I also think this is why people like Taleb rail against CEOs who get rewards without accountability.

Naval: Yeah. Taleb's Skin In The Game is required reading. If you want to get anywhere in modern life and understand how modern systems work, then Skin In The Game would be near the top of my list to read.

Accountability, skin in the game, these concepts go very closely hand in hand. I think of accountability as reputational skin in the game. It's putting your personal reputation on the line as skin in the game.

Accountability is a simple concept. The only part of accountability that may be a little counterintuitive is that we're currently socially brainwashed to not take on accountability, not in a visible way.

I think there are ways to take on accountability where every member of a team can take on accountability for their portion. That is how you get a well-functioning team while still putting credits and losses in the correct columns.

Everyone is fighting over labor and capital

Our brains aren't evolved to comprehend new forms of leverage

Nivi: Why don't we talk a little bit about leverage?

The first tweet in the storm was a famous quote from Archimedes, which was, “Give me a lever long enough and a place to stand and I will move the Earth.”

The next tweet was, “Fortunes require leverage. Business leverage comes from capital, people and products with no marginal costs of replication.”

Naval: Leverage is critical. The reason I stuck in Archimedes quote in there is... normally I don't like putting other people's quotes in my Twitter. That doesn't add any value. You can go look up those people's quotes. But this quote I had to put in there because it's just so fundamental. I read it when I was very, very young and it had a huge impression on me.

We all know what leverage is when we use a seesaw or a lever. We understand how that works physically, but I think what our brains aren't really well-evolved to comprehend is how much leverage is possible in modern society and what the newest forms of leverage are.

Society overvalues labor leverage

The oldest form of leverage is labor, which is people working for you. Instead of me lifting rocks, I can have 10 people lift rocks. Then just by my guidance on where the rock should go, a lot more rocks get moved than I could do myself. Everybody understands this because we're evolved to understand the labor form of leverage, so what happens is society overvalues labor as a form of leverage.

This is why your parents are impressed when you get a promotion and you have lots of people working underneath you. This is why when a lot of naive people, when you tell them about your company, they'll say, “How many people work there?” They'll use that as a way to establish credibility. They're trying to measure how much leverage and impact you actually have.

Or when someone starts a movement, they'll say how many people they have or how big the army is. We just automatically assume that more people is better.

You want the minimum amount of labor that allows you to use the other forms of leverage

I would argue that this is the worst form of leverage that you could possibly use. Managing other people is incredibly messy. It requires tremendous leadership skills. You're one short hop from a mutiny or getting eaten or torn apart by the mob.

It's incredibly competed over. Entire civilizations have been destroyed over this fight. For example, communism, Marxism, is all about the battle between capital and labor, das kapital and das labor. It's kind of a trap.

You really want to stay out of labor-based leverage. You want the minimum amount of people working with you that are going to allow you to use the other forms of leverage, which I would argue are much more interesting.

Capital has been the dominant form of leverage in the last century

The second type of leverage is capital. This one's a little less hardwired into us because large amounts of money moving around and being saved and being invested in money markets, these are inventions of human beings the in last few hundred to few thousand years. They're not evolved with us from hundreds of thousands of years.

We understand them a little bit less well. They probably require more intelligence to use correctly, and the ways in which we use them keep changing. Management skills from a hundred years ago might still apply today, but investing in the stock market skills from a hundred years ago probably don't apply to the same level today.

Capital is a trickier form of leverage to use. It's more modern. It's the one that people have used to get fabulously wealthy in the last century. It's probably been the dominant form of leverage in the last century.

You can see this by who are the richest people. It's bankers, politicians in corrupt countries who print money, essentially people who move large amounts of money around.

If you look at the top of very large companies, outside of technology companies, in many, many large old companies, the CEO job is really a financial job. They're really financial asset managers. Sometimes, an asset manager can put a pleasant face on it, so you get a Warren Buffet type.

But deep down, I think we all dislike capital as a form of leverage because it feels unfair. It's this invisible thing that can be accumulated and passed across generations and suddenly seems to result in people having gargantuan amounts of money with nobody else around them or necessarily sharing in it.

That said, capital is a powerful form of leverage. It can be converted to labor. It can be converted to other things. It's very surgical, very analytical.

If you are a brilliant investor and give \$1 billion and you can make a 30% return with it, whereas anybody else can only make a 20% return, you're going to get all the money and you're going to get paid very handsomely for it.

It scales very, very well. If you get good at managing capital, you can manage more and more capital much more easily than you can manage more and more people.

You need specific knowledge and accountability to obtain capital

It is a good form of leverage, but the hard part with capital is how do you obtain it? That's why I talked about specific knowledge and accountability first.

If you have specific knowledge in a domain and if you're accountable and you have a good name in that domain, then people are going to give you capital as a form of leverage that you can use to then go get more capital.

Capital also is fairly well understood. I think a lot of the knocks against capitalism come because of the accumulation of capital.

Create software and media that work for you while you sleep

Product and media are the new leverage

Naval: The most interesting and the most important form of leverage is this idea of products that have no marginal cost of replication. This is the new form of leverage.

This was only invented in the last few hundred years. It got started with the printing press. It accelerated with broadcast media, and now it's really blown up with the Internet and with coding.

Now, you can multiply your efforts without having to involve other humans and without needing money from other humans.

This podcast is a form of leverage. Long ago, I would have had to sit in a lecture hall and lecture each of you personally. I would have maybe reached a few hundred people and that would have been that.

Then 40 years ago, 30 years ago, I would have to be lucky to get on TV, which is somebody else's leverage. They would have distorted the message. They would have taken the economics out of it or charged me for it. They would have muddled the message, and I would have been lucky to get that form of leverage.

Today, thanks to the Internet, I can buy a cheap microphone, hook it up to a laptop or an iPad, and there you are all listening.

Product leverage is where the new fortunes are made

This newest form of leverage is where all the new fortunes are made, all the new billionaires. The last generation, fortunes were made by capital. That was the Warren Buffets of the world.

But the new generation's fortunes are all made through code or media. Joe Rogan making 50 to a 100 million bucks a year from his podcast. You're going to have a PewDiePie. I don't know how much money he's rolling in, but he's bigger than the news. The Fortnite players. Of course Jeff Bezos and Mark Zuckerberg and Larry Page and Sergey Brin and Bill Gates and Steve Jobs. That is all code-based leverage.

Combining all three forms of leverage is a magic combination

Now, the beauty is when you combine all of these three. That's where tech startups really excel, where you take just the minimum, but highest output labor that you can get, which are engineers, and designers, product developers. Then you add in capital. You use that for marketing, advertising, scaling. You add in lots of code and media and podcasts and content to get it all out there.

That is a magic combination, and that's why you see technology startups explode out of nowhere, use massive leverage and just make huge outside returns.

Product and media leverage are permissionless

Nivi: Do you want to talk a little bit about permissioned versus permissionless?

Naval: Probably the most interesting thing to keep in mind about the new forms of leverage is they are permissionless. They don't require somebody else's permission for you to use them or succeed.

For labor leverage, somebody has to decide to follow you. For capital leverage, somebody has to give you money to invest or to turn into a product.

Coding, writing books, recording podcasts, tweeting, YouTubing, these kinds of things, these are permissionless. You don't need anyone's permission to do them, and that's why they are very egalitarian. They're great equalizers of leverage.

As much as people may rail on Facebook and YouTube, they're not going to stop using it because this permissionless leverage, where everyone can be a broadcaster, is just too good.

The same way you can rail upon Apple for having a slightly closed ecosystem in the iPhone, but everyone's writing apps for it. As long as you can write apps for it, you can get rich or reach users doing that, why not?

The robot army is already here—code lets you tell them what to do

I think of all the forms of leverage, the best one in modern society ... This is glib. This is a little overused. This is why I tell people learn to code. It's that we have this idea that in the future there's going to be these robots and they're going to be doing everything.

That may be true, but I would say that the majority of the robot revolution has already happened. The robots are already here and there are way more robots than there are humans, it's just that we pack

them in data centers for heat and efficiency reasons. We put them in servers. They're inside the computers. All the circuits, it's robot minds inside that's doing all the work.

Every great software developer, for example, now has an army of robots working for him at nighttime, while he or she sleeps, after they've written the code and it's just cranking away.

The robot army is already here. The robot revolution has already happened. We're about halfway through it. We're just adding in much more of the hardware component these days as we get more comfortable with the idea of autonomous vehicles and autonomous airplanes and autonomous ships and maybe autonomous trucks. There're delivery bots and Boston Dynamics robots and all that.

But robots who are doing web searching for you, for example, are already here. The ones who are cleaning up your video and audio and transmitting it around the world are already here. The ones who are answering many customer service queries, things that you would have had to call a human for are already here.

An army of robots is already here. It's very cheaply available. The bottleneck is just figuring out intelligent and interesting things to do to them.

Essentially you can order this army of robots around. The commands have to be issued in a computer language, in a language that they understand.

These robots aren't very smart. They have to be told very precisely what to do and how to do it. Coding is such a great superpower because now you can speak the language of the robot armies and you can tell them what to do.

Nivi: I think at this point, people are not only commanding the army of robots within servers through code, they're actually manipulating the movement of trucks, of other people. Just ordering a package on Amazon, you're manipulating the movement of many people and many robots to get a package delivered to you.

People are doing the same things to build businesses now. There's the army of robots within servers and then there's also an army of actual robots and people that are being manipulated through software.

The best products tend to be available to everyone

Product leverage is a positive-sum game

Naval: Labor and capital are much less egalitarian, not just in the inputs, but in their outputs.

Let's say that I need something that humans have to provide like if I want a massage or if I need someone to cook my food. The more of a human element there is in providing that service, the less egalitarian it is. Jeff Bezos probably has much better vacations than most of us because he has lots of humans running around doing whatever he needs to do.

If you look at the output of code and media, Jeff Bezos doesn't get to watch better movies and TV than we do. Jeff Bezos doesn't get to even have better computing experience. Google doesn't give him some premium, special Google account where his searches are better.

It's the nature of code and media output that the same product is accessible to everybody. It turns into a positive sum game where if Jeff Bezos is consuming the same product as a thousand other people, that product is going to be better than the version that Jeff would consume on his own.

Status goods are limited to a few people

Whereas with other products, that's not true. If you look at something like buying a Rolex, which is no longer about telling time. It's a signaling good. It's all about showing off, "I have a Rolex." That's a zero-sum game.

If everybody in the world is wearing a Rolex, then people don't want to wear Rolexes anymore because they no longer signal. It's canceled out the effect.

Rich people do have an advantage in consuming that product. They'll just price it up until only they can have Rolexes. Then poor people can't have Rolexes and Rolexes resume their signaling value.

The best products tend to be targeted at the middle class

Something like watching Netflix or using Google or using Facebook or YouTube or even frankly modern day cars. Rich people don't have better cars. They just have weirder cars.

You can't drive a Lamborghini on the street at any speed that makes sense for a Lamborghini, so it's actually a worse car in the street. It just turned into a signaling good at that point. Your sweet spot, where you want to be, is somewhere like a Tesla Model 3 or like a Toyota Corolla which is an amazing car.

A new Toyota Corolla is a really nice car, but because it's mainstream, the technology has amortized the cost of production over the largest number of consumers possible.

The best products tend to be at the center, at the sweet spot, the middle class, rather than being targeted at the upper class.

Creating wealth with product leads to more ethical wealth

I think one of the things that we don't necessarily appreciate in modern societies is as the forms of leverage have gone from being human-based, labor-based and being capital-based to being more product and code and media-based, that most of the goods and services that we consume are becoming much more egalitarian in their consumption.

Even food is becoming that way. Food is becoming cheap and abundant, at least in the first world, too much so to our detriment. Jeff Bezos isn't necessarily eating better food. He's just eating different food or he's eating food that's prepared and served theatrically, so it's almost like more of again the human element of performance.

But the labor element out of food production has gone down massively. The capital element has gone down massively. Even food production itself has become more technology-oriented, and so the gap between the haves and the have-nots is getting smaller.

If you care about ethics in wealth creation, it is better to create your wealth using code and media as leverage because then those products are equally available to everybody as opposed to trying to create your wealth through labor or capital.

You want to use the product that is used by the most people

What I'm referring to here is scale economies. Technology products and media products have such amazing scale economies that you always want to use the product that is used by the most people. The one that's used by the most people ends up having the largest budget. There's no marginal cost of adding another user, and so with the largest budget, you get the highest quality.

The best TV shows are actually not going to be some obscure ones just made for a few rich people. They're going to be the big budget ones, like the Game of Thrones or the Breaking Bad or Bird Box, where they have massive, massive budgets. They can just use those budgets to get to a certain quality level.

Then rich people, to be different, they have to fly to Sundance and watch a documentary. You and I aren't going to fly to Sundance because that's something that bored rich people do to show off. We're not going to watch a documentary because most of them just aren't actually even that good.

Again, if you're wealthy today, for large classes of things, you spend your money on signaling goods to show other people that you're wealthy, then you try and convert them to status. As opposed to actually consuming the goods for their own sake.

Nivi: People and capital as a form of leverage have a negative externality and code and product have a positive externality attached to them, if I was going to sum up your point.

Capital and labor are becoming permissionless

I think that capital and labor are also starting to become a little more permissionless or at least the permissioning is diffuse because of the Internet. Instead of labor, we have community now, which is a diffused form of labor. For example, Mark Zuckerberg has a billion people doing work for him by using Facebook.

Instead of going to raise capital from someone who's rich, now we have crowdfunding. You can raise millions and millions of dollars for a charity, for a health problem or for a business. You can do it all online.

Capital and labor are also becoming permissionless, and you don't need to necessarily do it the old fashioned way, where you have to go around and ask people for permission to use their money or their time.

An ideal business model has network effects, low marginal costs and scale economies

Scale economies: the more you produce, the cheaper it gets

Nivi: One more question about leverage. Do you think a choice of business model or a choice of product can also bring a kind of leverage to it?

For example, pursuing a business that has network effects. Pursuing a business that has brand effects. Or other choices of business model that people could manipulate that just give you free leverage.

Naval: Yeah, there's some really good microeconomic concepts that are important to understand.

One of those is scale economies, which is the more you produce of something the cheaper it gets to make it. That's something that a lot of businesses have, Basic Economics 101.

You should try and get into a business where making Widget Number 12 is cheaper than making Widget Number 5, and making Widget Number 10,000 is a lot cheaper than the previous ones. This builds up an automatic barrier to entry against competition and getting commoditized. That's an important one.

Zero marginal cost of reproduction: producing more is free

Another one is, and this is along the same lines, but technology products especially, and media products, have this great quality where they have zero marginal cost of reproduction. Creating another copy of what you just created is free.

When somebody listens to this podcast or watches a YouTube video about this, it doesn't cost me anything for the next person who shows up. Those zero marginal cost things, they take a while to get going because you make very little money per user, but over time they can really, really add up.

Joe Rogan is working no harder on his current podcast than he was on Podcast number 1, but on Podcast number 1,100 he's making a million dollars from the podcast whereas for the previous one he probably lost money; for the first one. That's an example of zero marginal cost.

Network effects: value grows as the square of the customers

Then, the most subtle but the most important is this idea of network effects. It comes from computer networking. Bob Metcalfe, who created Ethernet, famously coined Metcalfe's Law, which is the value of a network is proportional to the square of the number of nodes in the network.

If a network of size 10 would have a value of a 100, a network of a size 100 would have a value of 10,000. It's not just 10 times more, it's 100 times more, because of the square; the difference is the square.

You want to be in a network effects business, assuming you're not number two. If you're number one in network effect business, you win everything. Example: if you look at Facebook, your friends and family social networking protocol. Who's their competitor? Nobody, because they won everything through network effects. Which is why when people say, "Well, I can just switch away from Facebook," they don't realize that network effects create natural monopolies. They're very, very powerful things.

Network effect businesses are natural monopolies

One of the dirty secrets of Silicon Valley is that a lot of the winning businesses are natural monopolies. Even ride-sharing tends towards one winner-take-all system.

Uber will always have better economics than Lyft, as long as it's moving more drivers and more riders around. Something like Google, there's basically only one viable search engine. I do like DuckDuckGo, privacy reasons, but they're just always gonna be behind because of network effects. Twitter: where else would you go for microblogging? Even YouTube has weak network effects, but they're still powerful enough that there's really no number two site that you go to, to consume your video on a regular basis. It even turns out in e-tail, Amazon Prime and kind of the convenience of stored credit cards and information creates a powerful network effect.

In a network effect, each new user adds value to the existing users

What is a network effect? Let's just define it precisely. A network effect is when each additional user adds value to the existing user base. Your users themselves are creating some value for the existing users.

The classic example that I think everybody can understand is, language. Let's say that there's 100 people living in the community and speak 10 different languages, and each person just speaks one of those 10. Well, you're having to translate all the time; it's incredibly painful. But if all 100 of you spoke the same language, it would add tremendous value.

The way that community will play out is, 10 people start off speaking 10 languages, and let's say one extra person learns English. Well, now all of a sudden, 11 people know English, so the next person comes in to learn a new language is probably going to choose English. At some point, let's say English gets to 20 or 25 people, it's done. It's just going to own the entire language marketplace, and the rest of the languages will get competed out.

Which is why, long-term, the entire world is probably going to end up speaking English and Chinese. China's closed off on the Internet, but the Internet itself is a great leveler, and people who want to communicate on the Internet are forced to speak English because the largest community of people on the Internet speaks English.

I always feel bad for my colleagues who grew up speaking foreign languages in foreign countries, because you don't have access to so many books; so many books just haven't been translated into other languages. If you only spoke French, or you only spoke German, or you only spoke Hindi, for example, you would be at a severe disadvantage in a technical education.

Invariably, if you go and get a technical education, you have to learn English just because you have to read these books that have this data that has not been translated. Languages are probably the oldest example of network effect.

Money is another example. We should all probably be using the same money, except for the fact that geographic and regulatory boundaries have created these artificial islands of money. But even then, the world tends to use a single currency as the reserve currency at most times; currently, the US dollar.

Zero marginal cost businesses can pivot into network effect businesses

Network effects are a very powerful concept, and when you're picking a business model, it's a really good idea to pick a model where you can benefit from network effects, low marginal costs, and scale economies; and these tend to go together.

Anything that has zero marginal costs of production obviously has scale economies, and things that have zero marginal costs of reproduction very often tend to have network effects, because it doesn't cost you anything more to stamp out the thing. So then you can just create little hooks for users to add value to each other.

You should always be thinking about how your users, your customers, can add value to each other because that is the ultimate form of leverage. You're at the beach in the Bahamas or you're sleeping at night and your customers are adding value to each other.

From low to high specific knowledge, accountability and leverage

Laborers get paid hourly and have low accountability

Naval: The tweetstorm is very abstract. It's deliberately meant to be broadly applicable to all kinds of different domains and disciplines and time periods and places. But sometimes it's hard to work without a concrete example. So let's go concrete for a minute.

Look at the real estate business. You could start at the bottom, let's say you're a day laborer. You come in, you fix people's houses. Someone orders you around, tells you, "Break that piece of rock. Sand that piece of wood. Put that thing over there."

There's just all these menial jobs that go on, on a construction site. If you're working one of those jobs, unless you're a skilled trade, say, a carpenter or electrician, you don't really have specific knowledge.

Even a carpenter or an electrician is not that specific because other people can be trained how to do it. You can be replaced. You get paid your \$15, \$20, \$25, \$50, if you're really lucky, \$75 an hour, but that's about it.

You don't have any leverage other than from the tools that you're using. If you're driving a bulldozer that's better than doing it with your hands. A day laborer in India makes a lot less because they have no tool leverage.

You don't have much accountability. You're a faceless cog in a construction crew and the owner of the house or the buyer of the house doesn't know or care that you worked on it.

General contractors get equity, but they're also taking risk

One step up from that, you might have a contractor, like a general contractor who someone hires to come and fix and repair and build up their house. That general contractor is taking accountability; they're taking responsibility.

Now let's say they got paid \$250,000 for the job. Sorry, I'm using Bay Area prices, so maybe I'll go rest of the world prices, \$100,000 for the job to fix up a house, and it actually costs the general contractor, all said and done, \$70,000. That contractor's going to pocket that remaining \$30,000.

They got the upside. They got the equity but they're also taking accountability and risk. If the project runs over and there's losses, then they eat the losses. But you see, just the accountability gives them some form of additional potential income.

Then, they also have labor leverage because they have a bunch of people working for them. But it probably tops out right there.

Property developers pocket the profit by applying capital leverage

You can go one level above that and you can look at a property developer. This might be someone who is a contractor who did a bunch of houses, did a really good job, then decided to go into business for themselves and they go around looking for beaten down properties that have potential.

They buy them, they either raise money from investors or front it themselves, they fix the place up, and then they sell it for twice what they bought it for. Maybe they only put in 20% more, so it's a healthy profit.

So now a developer like that takes on more accountability, has more risk. They have more specific knowledge because now you have to know: which neighborhoods are worth buying in. Which lots are actually good or which lots are bad. What makes or breaks a specific property. You have to imagine the finished house that's going to be there, even when the property itself might look really bad right now.

There's more specific knowledge, there's more accountability and risk, and now you also have capital leverage because you're also putting in money into the project. But conceivably, you could buy a piece of land or a broken-down house for \$200,000 and turn it into a million dollar mansion and pocket all the difference.

Architects, large developers and REITs are even higher in the stack

One level beyond that might be a famous architect or a developer, where just having your name on a property, because you've done so many great properties, increases its value.

One level up from that, you might be a person who decides, well, I understand real estate, and I now know enough of the dynamics of real estate that rather than just build and flip my own properties or improve my own properties, I'm gonna be a massive developer. I'm going to build entire communities.

Now another person might say, "I like that leverage, but I don't want to manage all these people. I want to do it more through capital. So I'm gonna start a real estate investment trust." That requires specific knowledge not just about investing in real estate and building real estate, but it also requires specific knowledge about the financial markets, and the capital markets, and how real estate trusts operate.

Real estate tech companies apply the maximum leverage

One level beyond that might be somebody who says, "Actually, I want to bring the maximum leverage to bear in this market, and the maximum specific knowledge." That person would say, "Well, I understand real estate, and I understand everything from basic housing construction, to building properties and selling them, to how real estate markets move and thrive, and I also understand the technology business. I understand how to recruit developers, how to write code and how to build good product, and I understand how to raise money from venture capitalists and how to return it and how all of that works."

Obviously not a single person may know this. You may pull a team together to do it where each have different skill sets, but that combined entity would have specific knowledge in technology and in real estate.

It would have massive accountability because that company's name would be a very high risk, high reward effort attached to the whole thing, and people would devote their lives to it and take on significant risk.

It would have leverage in code with lots of developers. It would have capital with investors putting money in and the founder's own capital. It would have labor of some of the highest quality labor that you can find, which is high quality engineers and designers and marketers who are working on the company.

Then you may end up with a Trulia or a RedFin or a Zillow kind of company, and then the upside could potentially be in the billions of dollars, or the hundreds of millions of dollars.

As you layer in more and more kinds of knowledge that can only be gained on the job and aren't common knowledge, and you layer in more and more accountability and risk-taking, and you layer in more and more great people working on it and more and more capital on it, and more and more code and media on it, you keep expanding the scope of the opportunity all the way from the day-laborer, who might just literally be scrapping on the ground with their hands, all the way up to somebody who started a real estate tech company and then took it public.

In an age of nearly infinite leverage, judgment is the most important skill

In an age of infinite leverage, judgment becomes the most important skill

Nivi: We spoke about specific knowledge, we talked about accountability, we talked about leverage. The last skill that Naval talks about in his tweetstorm is judgment, where he says, that "Leverage is a force multiplier for your judgment."

Naval: We are now living in an age of nearly infinite leverage, and all the great fortunes are created through leverage. Your first job is to go and obtain leverage, and you can obtain leverage through permission by getting people to work for you, or by raising capital.

Or you can get leverage permissionlessly by learning how to code or becoming good communicator and podcasting, broadcasting, creating videos, writing, etc.

That's how you get leverage, but once you have leverage, what do you do with it? Well, the first part of your career's spent hustling to get leverage. Once you have the leverage, then you wanna slow down a bit, because your judgment really matters.

It's like you've gone from steering your sailboat around to now you're steering an ocean liner or a tanker. You have a lot more at risk, but you have a lot more to gain as well. You're carrying a much higher payload. In an age of infinite leverage, judgment becomes the most important skill.

Warren Buffett is so wealthy now because of his judgment. Even if you were to take away all of Warren's money, tomorrow, investors would come out of the woodwork and hand him a \$100 billion because they know his judgment is so good, and they would give him a big chunk of that \$100 billion to invest.

Everything else you do is setting you up to apply judgment

Ultimately, everything else that you do is actually setting you up to apply your judgment. One of the big things that people rail on is CEO pay. For sure there's crony capitalism that goes on where these CEOs control their boards and the boards give them too much money.

But, there are certain CEOs who definitely earned their keep because their judgment is better. If you're steering a big ship, if you're steering Google or Apple, and your judgment is 10 or 20 percent better than the next person's, society will literally pay you hundreds of millions of dollars more, because you're steering a \$100 billion ship.

If you're on course 10 or 20 percent of the time more often than the other person, the compounding results on that hundreds of billions of dollars you're managing will be so large that your CEO pay will be dwarfed in comparison.

Demonstrated judgment, credibility around the judgment, is so critical. Warren Buffett wins here because he has massive credibility. He's been highly accountable. He's been right over and over in the public domain. He's built a reputation for very high integrity, so you can trust him.

A person like that, people will throw infinite leverage behind him because of his judgment. Nobody asks him how hard he works; nobody asks him when he wakes up or when he goes to sleep. They're like, "Warren, just do your thing."

Judgment, especially demonstrated judgment, with high accountability, clear track record, is critical.

Judgment is knowing the long-term consequences of your actions

Nivi: Let's define judgment. I would define it as knowing the long-term effects of your decisions, or being able to predict the long-term effects of your decisions.

Naval: It's funny. My definition of wisdom is knowing the long term consequences of your actions, so they're not all that different. Wisdom is just judgment on a personal domain.

Wisdom applied to external problems I think is judgment. They're highly linked. But, yes, it's knowing the long term consequences of your actions and then making the right decision to capitalize on that.

Without experience, judgment is often less than useless

Judgment is very hard to build up. This is where both intellect and experience come in play.

There are many problems with the so-called intellectuals in the ivory tower, but one of the reasons why Nassim Taleb rails against them is because they have no skin in the game. They have no real-world experience, so they just apply purely intellect.

Intellect without any experience is often worse than useless because you get the confidence that the intellect gives you, and you get some of the credibility, but because you had no skin in the game, and you had no real experience, and no real accountability, you're just throwing darts.

The real world is always far, far more complex than we can intellectualize. Especially all the interesting, fast-moving edge domains and problems, you can't get there without experience. If you are smart and you iterate fast, it's not even you put 10,000 hours into something, but you take 10,000 tries at something.

The people with the best judgment are among the least emotional

If you are smart and you have a lot of quick iterations, and you try to keep your emotions out of it, the people with the best judgment are actually among the least emotional. A lot of the best investors are considered almost robotic in that regard, but I wouldn't be surprised if even the best entrepreneurs often come across as unemotional.

There is sort of this archetype of the passionate entrepreneur, and yeah, they have to care about what they're doing, but they also have to see very clearly what's actually happening. The thing that prevents you from seeing what's actually happening are your emotions. Our emotions are constantly clouding our judgment, and in investing, or in running companies, or in building products, or being an entrepreneur, emotions really get in the way.

Emotions are what prevent you from seeing what's actually happening, until you can no longer resist the truth of what's happening, until it becomes too sudden, and then you're forced into suffering; which is sort of a breaking of this fantasy that you had put together.

Nivi: To try and connect some of these concepts, I would say that, first, you're accountable for your judgment. Judgment is the exercise of wisdom. Wisdom comes from experience; and that experience can be accelerated through short iterations.

Top investors often sound like philosophers

Naval: And the reason why a lot of the top investors, a lot of the value investors, like if you read Jeremy Grantham, or you read Warren Buffet, or you read up on Michael Burry, these people sound like philosophers, or they are philosophers, or they're reading a lot of history books or science books.

Like what are they doing, shouldn't they be reading investment books. No. Investment books are the worst place to learn about investment, because investment is a real-world activity that is highly multi-variate, all the advantages are always being competed away. It's always on the cutting-edge.

What you actually just need is very, very broad-based judgment and thinking. The best way to do that is to study everything, including a lot of philosophy. Philosophy also makes you more stoic, makes you less emotional, and so you make better decisions; you have better judgment.

The more outraged someone is, the worse their judgment

One simple thing is I see ... I go out on Twitter and it seems like half of Twitter is outraged at something at all times. You can go within someone's Twitter feed and get at least some semblance of what it must be like to be in their head all the time.

The more outraged somebody is, I guarantee you, the worse their judgment is. If someone's constantly tweeting political outrage, and just see like an angry person getting into fights, you don't want to hand this person the keys to your car, let alone the keys to your company.

Outsource tasks that cost less than your hourly rate

Set and enforce an aspirational hourly rate

Nivi: We covered the skills you need to get rich. They included specific knowledge, accountability, leverage, judgment and life-long learning. Let's talk about the importance of working hard and valuing your time.

Naval: No one is going to value you more than you value you. Set a high personal hourly rate, and stick to it. When I was young, I decided I was worth a lot more than the market thought I was worth. And I started treating myself that way.

Factor your time into every decision. Say you value your time at \$100 an hour. If you decide to spend an hour driving across town to get something, you're effectively throwing away \$100. Are you going to do that?

Say you buy something from Amazon and they screw it up. Is it worth your time to return it? Is it worth the mental hassle? Keep in mind that you will have less time for work, including mentally high-output work. Do you want to use that time running errands and solving little problems? Or do you want to save it for the big stuff?

The great scientists were terrible at managing their home lives. None of them had an organized room, or made social events on time, or sent their thank-you cards.

You can't penny pinch your way to wealth

You can spend your life however you want. But if you want to get rich, it has to be your top priority. It has to come before anything else, which means you can't penny-pinch. This is what people don't understand.

You can penny-pinch your way to basic sustenance. You can keep expenses low and maybe retire early. That's perfectly valid. But we're here to talk about wealth creation. If you're going to create wealth, it has to be your number-one, overwhelming priority.

My aspirational rate was \$5,000/hr

Fast-forward to your wealthy self and pick an intermediate hourly rate. Before I had any real money and you could hire me, I set an aspirational rate of \$5,000 an hour.

Of course, I still ended up doing stupid things like arguing with the electrician or returning the broken speaker. But I shouldn't have. And I did a lot less of it my friends. I would make a theatrical show out of throwing something in the trash or giving it to Salvation Army, rather than returning it or trying to fix it.

I would argue with girlfriends, "I don't do that. That's not a problem that I solve." I still argue that today with my wife and with my mother, when she hands me little to-do's. I say, "I would rather hire you an assistant." This was true even when I didn't have money.

If you can outsource something for less than your hourly rate, do it

Another way to think about this: If you can outsource something—or not do something—for less than your hourly rate, outsource it or don't do it. If you can hire someone to do it for less than your hourly rate, hire them. That includes things like cooking. You may want to make your own healthy, home-cooked meals. But if you can outsource it, do that instead.

People say, "What about the joy of life? What about getting it right, just your way?" Sure, you can do that. But you're not going to be wealthy, because you've made something else a priority.

Paul Graham said it well for Y Combinator startups. He said you should be working on your product and getting product-market fit, and you should be exercising and eating healthy. That's about it. That's all you have time for while you're on this mission.

Your hourly rate should seem absurdly high

Set a very high aspirational hourly rate for yourself, and stick to it. It should seem and feel absurdly high. If it doesn't, it's not high enough. Whatever you pick, my advice is to raise it.

For the longest time, I used \$5,000 an hour. If you extrapolate that out as an annual salary, it's multiple millions of dollars per year. I actually think I've beaten it, which is interesting given that I'm not the hardest worker. I work through bursts of energy when I'm motivated to work on something.

Even though what you work on and who you work with are more important

Work as hard as you can

Naval: Let's talk about hard work. There's a battle that happens on Twitter a lot. Should you work hard or should you not? David Heinemeier Hansson says, "It's like you're slave-driving people." Keith Rabois says, "No, all the great founders worked their fingers to the bone."

They're talking past each other.

First of all, they're talking about two different things. David is talking about employees and a lifestyle business. If you're doing that, your number one priority is not getting wealthy. You have a job, a family and also your life.

Keith is talking about the Olympics of startups. He's talking about the person going for the gold medal and trying to build a multi-billion dollar public company. That person has to get everything right. They have to have great judgment. They have to pick the right thing to work on. They have to recruit the right team. They have to work crazy hard. They're engaged in a competitive sprint.

If getting wealthy is your goal, you're going to have to work as hard as you can. But hard work is no substitute for who you work with and what you work on. Those are the most important things.

What you work on and who you work with are more important

Marc Andreessen came up with the concept of the “product-market fit.” I would expand that to “product-market-founder fit,” taking into account how well a founder is personally suited to the business. The combination of the three should be your overwhelming goal.

You can save a lot of time by picking the right area to work in. Picking the right people to work with is the next most important piece. Third comes how hard you work. They are like three legs of a stool. If you shortchange any one of them, the whole stool is going to fall. You can’t easily pick one over the other.

When you’re building a business, or a career, first figure out: “What should I be doing? Where is a market emerging? What’s a product I can build that I’m excited to work on, where I have specific knowledge?”

No matter how high your bar is, raise it

Second, surround yourself with the best people possible. If there’s someone greater out there to work with, go work with them. When people ask for advice about choosing the right startup to join, I say, “Pick the one that’s going to have the best alumni network for you in the future.” Look at the PayPal mafia — they worked with a bunch of geniuses, so they all got rich. Pick the people with the highest intelligence, energy and integrity that you can find.

And no matter how high your bar is, raise it.

Finally, once you’ve picked the right thing to work on and the right people, work as hard as you can.

Nobody really works 80 hours a week

This is where the mythology gets a little crazy. People who say they work 80-hour weeks, or even 120-hour weeks, often are just status signaling. It’s showing off. Nobody really works 80 to 120 hours a week at high output, with mental clarity. Your brain breaks down. You won’t have good ideas.

The way people tend to work most effectively, especially in knowledge work, is to sprint as hard as they can while they feel inspired to work, and then rest. They take long breaks.

It's more like a lion hunting and less like a marathoner running. You sprint and then you rest. You reassess and then you try again. You end up building a marathon of sprints.

Inspiration is perishable

Inspiration is perishable. When you have inspiration, act on it right then and there.

If I'm inspired to write a blog post or publish a tweetstorm, I should do it right away. Otherwise, it's not going to get out there. I won't come back to it. Inspiration is a beautiful and powerful thing. When you have it, seize it.

Impatience with actions, patience with results

People talk about impatience. When do you know to be impatient? When do you know to be patient? My glib tweet on this was: "Impatience with actions, patience with results." I think that's a good philosophy for life.

Anything you have to do, get it done. Why wait? You're not getting any younger.

You don't want to spend your life waiting in line. You don't want to spend it traveling back and forth. You don't want to spend it doing things that aren't part of your mission.

When you do these things, do them as quickly as you can and with your full attention so you do them well. Then be patient with the results because you're dealing with complex systems and a lot of people.

It takes a long time for markets to adopt products. It takes time for people to get comfortable working with each other. It takes time for great products to emerge as you polish away.

Impatience with actions, patience with results.

If I discover a problem in one of my businesses, I won't sleep until the resolution is at least in motion. If I'm on the board of a company, I'll call the CEO. If I'm running the company, I'll call my reports. If I'm responsible, I'll get on it, right then and there, and solve it.

If I don't solve a problem the moment it happens—or if I don't move towards solving it—I have no peace. I have no rest. I have no happiness until the problem is solved. So I solve it as quickly as possible. I literally won't sleep until it's solved—maybe that's just a personal characteristic. But it's worked out well in business.

Ruthlessly decline meetings

Be too busy to 'do coffee' while keeping an uncluttered calendar

Naval: Another tweet was: "You should be too busy to 'do coffee,' while still keeping an uncluttered calendar."

People who know me know I'm famous for simultaneously doing two things.

First, I keep a very clean calendar. I have almost no meetings on it. When some people see my calendar, they almost weep.

Second, I'm busy all the time. I'm always doing something. It's usually work-related. It's whatever high-impact thing that needs to be done, that I'm most inspired to do.

The only way to do that is to constantly, and ruthlessly, decline meetings.

People want to "do coffee" and build relationships. That's fine early in your career, when you're still exploring. But later in your career—when you're exploiting, and there are more things coming at you than you have time for—you have to ruthlessly cut meetings out of your life.

Ruthlessly cut meetings

If someone wants a meeting, see if they will do a call instead. If they want to call, see if they will email instead. If they want to email, see if they will text instead. And you probably should ignore most text messages—unless they're true emergencies.

You have to be utterly ruthless about dodging meetings. When you do meetings, make them walking meetings. Do standing meetings. Keep them short, actionable and small. Nothing is getting done in a meeting with eight people around a conference table. You are literally dying one hour at a time.

Nivi: "Doing coffee" reminds me of an old quote, I think from Steve Jobs, when someone asked him why Apple didn't come to a convention. His response was something like, "Because we wouldn't be here working."

Naval: I used to have a tough time turning people down for meetings. Now I just tell them outright, "I don't do non-transactional meetings. I don't do meetings without a strict agenda. I don't do meetings unless we absolutely have to."

Nivi used to do this. When people asked us for get-to-know-you meetings, he would say, "We don't do meetings unless it's life-and-death urgent." The person has to respond, "Yeah, it's life-and-death urgent" or there's no meeting.

People will meet with you when you have proof of work

Busy people will take your meeting when you have something important or valuable. But you have to come with a proper calling card. It should be: "Here's what I've done. Here's what I can show you. Let's meet if this is useful to you, and I'll be respectful of your time."

You have to build up credibility. For example, when a tech investor looks at a startup, the first thing they want to see is evidence of product progress. They don't just want to see a slide deck. Product progress is the entrepreneur's resume. It's an unfake-able resume.

You have to do the work. To use a crypto analogy, you have to have proof of work. If you have that and you truly have something interesting, then you shouldn't hesitate to put it together in an email and send it. Even then, when asking for a meeting, you want to be actionable.

Free your time and mind

If you think you're going to "make it" by networking and attending a bunch of meetings, you're probably wrong. Networking can be important early in your career. And you can get serendipitous with meetings. But the odds are pretty low.

When you meet people hoping for that lucky break, you're relying on Type One luck, which is blind luck, and Type Two luck, which is hustle luck.

But you're not getting Type Three or Type Four luck, which are the better kinds. This is where you spend time developing a reputation and working on something. You develop a unique point of view and are able to spot opportunities that others can't.

A busy calendar and a busy mind will destroy your ability to do great things in this world. If you want to do great things—whether you're a musician or entrepreneur or investor—you need free time and a free mind.

Become the best in the world at what you do

Keep redefining what you do until you're the best at what you do

Nivi: We talked about the importance of working hard and valuing your time. Next, there are a few tweets on the topic of working for the long-term. The first tweet is: "Become the best in the world at what you do. Keep redefining what you do until this is true."

Naval: If you really want to get paid in this world, you want to be number one at whatever you do. It can be niche—that's the point. You can literally get paid for just being you.

Some of the more successful people in the world are that way. Oprah gets paid for being Oprah. Joe Rogan gets paid for being Joe Rogan. They're being authentic to themselves.

You want to be number one. And you want to keep changing what you do until you're number one. You can't just pick something arbitrary. You can't say, "I'm going to be the fastest runner in the world," and now you have to beat Usain Bolt. That's too hard of a problem.

Keep changing your objective until it arrives at your specific knowledge, skill sets, position, capabilities, location and interests. Your objective and skills should converge to make you number one.

When you're searching for what to do, you have two different foci to keep in mind. One is, "I want to be the best at what I do." The second is, "What I do is flexible, so that I'm the best at it."

You want to arrive at a comfortable place where you feel, "This is something I can be amazing at, while still being authentic to who I am."

It's going to be a long journey. But now you know how to think about it.

Find founder-product-market fit

The most important thing for any company is to find product-market fit. But the most important thing for any entrepreneur is to find founder-product-market fit, where you are naturally inclined to build the right product for a market. That's a three-foci problem. You have to make all three work at once.

If you want to be successful in life, you have to get comfortable managing multi-variate problems and multiple-objective functions at once. This is one of those cases where you have to map at least two or three at once.

Nobody can compete with you on being you

Competition will trap you in a lesser game

Nivi: Let's discuss your tweet: "Escape competition through authenticity." It sounds like part of this is a search for who you are.

Naval: It's both a search and a recognition. Sometimes when we search our egos, we want to be something that we're not. Our friends and family are actually better at telling us who we are. Looking back at what we've done is a better indicator of who we are.

Peter Thiel talks a lot about how competition is besides the point. It's counterproductive. We're highly memetic creatures. We copy everybody around us. We copy our desires from them.

If everyone around me is a great artist, I want to be an artist. If everyone around me is a great businessperson, I want to be a businessperson. If everybody around me is a social activist, I want to be a social activist. That's where my self-esteem will come from.

You have to be careful when you get caught up in status games. You end up competing over things that aren't worth competing over.

Peter Thiel talks about how he was going to be a law clerk because everybody at law school wanted to clerk for a Supreme Court justice or some famous judge. He got rejected, and that's what made him go into business. It helped him break out of a lesser game and into a greater game.

Sometimes you get trapped in the wrong game because you're competing. The best way to escape competition—to get away from the specter of competition, which is not just stressful and nerve-wracking but also will drive you to the wrong answer—is to be authentic to yourself.

No one can compete with you on being you

If you are building and marketing something that's an extension of who you are, no one can compete with you. Who's going to compete with Joe Rogan or Scott Adams? It's impossible. Is somebody else going to write a better Dilbert? No. Is someone going to compete with Bill Watterson and create a better Calvin and Hobbes? No.

Artists are, by definition, authentic. Entrepreneurs are authentic, too. Who's going to be Elon Musk? Who's going to be Jack Dorsey? These people are authentic, and the businesses and products they create are authentic to their desires and means.

If somebody else came along and started launching rockets, I don't think it would faze Elon one bit. He's still going to get to Mars. Because that's his mission, insane as it seems. He's going to accomplish it.

Authenticity naturally gets you away from competition. Does it mean that you want to be authentic to the point where there's no product-market fit? It may turn out that you're the best juggler on a unicycle. But maybe there isn't much of a market for that, even with YouTube videos. So you have to adjust until you find product-market fit.

At least lean towards authenticity, towards getting away from competition. Competition leads to copy-cattening and playing the completely wrong game.

In entrepreneurship, the masses are never right

In entrepreneurship, the masses are never right. If the masses knew how to build great things and create great wealth, we'd all be rich by now.

When you see a lot of competition, sometimes that indicates the masses have already arrived. It's already competed over too much. Or it's the wrong trend to begin with.

On the other hand, if the whole market is empty, that can be a warning indicator. It can indicate you've gone too authentic and should focus more on the product-market part of founder-product-market fit.

There's a balance you have to find. Generally, people will make the mistake of paying too much attention to the competition. The great founders tend to be authentic iconoclasts.

Combine your vocation and avocation

Nivi: Do you think one way of getting to authenticity is by finding five or six various skills you already do and stacking them on top of each other, maybe not even in any purposeful way? If you are expressing who you are, you're going to be expressing all of these skills anyway.

Naval: If you are successful, in the long-term you'll find you're almost doing all of your hobbies for a living, no matter what they are. As Robert Frost said, "my goal in life is to unite my avocation with my vocation." That's really where life is going to lead you anyway.

You're right about the skill stack. Everyone has multiple skills. We aren't one-dimensional creatures, even though that's how we portray ourselves in online profiles to get employed. You meet somebody and they say, "I'm a banker." Or, "I'm a bartender. Or "I'm a barber."

Specialize in being you

But people are multivariate. They have a lot of skills. One banker might be good at finance. Another one might be good at sales. A third one might be good at macroeconomic trends and have a feel for markets. Another one might be really good at picking individual stocks. Another might be good at maintaining relationships, rather than selling new relationships. Everyone's going to have various niches. And you're going to have multiple niches. It's not going to be just one.

As you go through your career, you'll find you gravitate towards the things you're good at, which by definition are the things you enjoy doing. Otherwise, you wouldn't be good at them. You wouldn't have put in the time.

Other people will push you towards the things you're good at, too. Because your smart bosses, co-workers and investors will realize you're world-class in this one thing. And you can recruit people to help you with other things.

Ideally, you want to end up specializing in being you.

Competition will blind you to greater games

Businesses that seem like they're in direct competition really aren't

Nivi: When you're being authentic, you don't mind competition that much. It pisses you off and inspires some fear, jealousy and other emotions. But you don't really mind because you're oriented towards the goal and the mission. Worst-case, you might get some ideas from them. And often there are ways to work with the competition in a positive way that ends up increasing the size of the market for you.

Naval: It depends on the nature of the business. The best Silicon Valley tech industry businesses tend to be winner-take-all. When you see competition, it can make you fly into a rage. Because it really does endanger everything you've built.

If I'm opening a restaurant and a more interesting version of the same restaurant opens in a different town, that's fantastic. I'm going to copy what's working and drop what's not working. So it depends on the nature of the business.

Often, businesses that seem to be in direct competition really aren't. They end up adjacent or slightly different. You're one step away from a completely different business, and sometimes you need to take that step. You're not going to take it if you're busy fighting over a booby prize.

You're playing a stupid game. You're going to win a stupid prize. It's not obvious right now because you're blinded by competition. But three years from now, it'll be obvious.

My first company got caught in the wrong game

One of my first startups was Epinions, an online product review site that was independent of Amazon. That space eventually turned into TripAdvisor and Yelp, which is where we should have gone.

We should have done more local reviews. A review of a scarce item like a local restaurant is more valuable than one of an item like a camera that has 1,000 reviews on Amazon.

Before we could get there, we got caught up in the comparison-shopping game. We merged with DealTime and competed with a bunch of price-comparison engines—mySimon, PriceGrabber, NexTag and Bizrate, which became Shopzilla. We were caught in fierce competition with each other.

That whole space went to zero because Amazon won e-tail completely. There was no need for price comparison. Everyone just went to Amazon.

We got the booby prize because we were caught up in competition with a bunch of our peers. We should have been looking at what the consumer really wanted and being authentic to ourselves, which was

reviews, not price comparison. We should have gone further into esoteric items where customers had less data and wanted reviews more badly.

If we stayed authentic to ourselves, we would have done better.

On a long enough timescale, you will get paid

On a long enough time scale, you will get paid

Nivi: We're talking about working for the long-term. The next tweet on that topic: "Apply specific knowledge, with leverage, and eventually you will get what you deserve."

I would add: Apply judgment, apply accountability, and apply the skill of reading.

Naval: This one is a glib way of saying, "It takes time." Once you have all of the pieces in place, there's still an indeterminate amount of time you have to put in. And if you're counting, you'll run out of patience before it arrives.

You have to make sure you give these things time. Life is long.

Charlie Munger had a line on this. Somebody asked him about making money. He said what the questioner actually was asking was, "How can I become like you, except faster?"

Everybody wants it immediately. But the world is an efficient place. Immediate doesn't work. You have to put in the time. You have to put in the hours. You have to put yourself in that position with specific knowledge, accountability, leverage and an authentic skill-set in order to be the best in the world at what you do.

And then you have to enjoy it and keep doing it and doing it and doing it. Don't keep track. Don't keep count. Because if you do, you will run out of time.

Looking back on my career, the people who I identified as brilliant and hardworking two decades ago are all successful now, almost without exception. On a long enough timescale, you will get paid.

But it can easily be 10 or 20 years. Sometimes it's five. If it's five, or three, and it's a friend of yours who got there, it can drive you insane. But those are exceptions. And for every winner, there are multiple failures.

One thing that's important in entrepreneurship: You just have to be right once. You get many, many shots on goal. You can take a shot on goal every three to five years, maybe every 10 at the slowest. Or once every year at the fastest, depending on how you're iterating with startups. But you only have to be right once.

What are you really good at, that the market values?

Nivi: Your eventual outcome will be equal to something like the distinctiveness of your specific knowledge; times how much leverage you can apply to that knowledge; times how often your judgment is correct; times how singularly accountable you are for the outcome; times how much society values what you're doing. Then you compound that with how long you can keep doing it and how long you can keep improving it through reading and learning.

Naval: That's a really good way to summarize it. It's worth trying to sketch that equation out.

That said, people try to apply mathematics to what is really philosophy. I've seen this happen, where I say one thing and then I say another thing that seems contradictory if you treat it as math. But it's obviously in a different context.

People will say, "You say, 'Desire is suffering.'" You know, the Buddhist saying. "And then you 'All greatness comes from suffering.' So does that mean all greatness comes from desire?" This isn't math. You can't just carry variables around and form absolute logical outputs. You have to know when to apply things.

One can't get too analytical about it.

It's what a physicist would call "false precision." When you take two made-up estimates and multiply them together, you get four degrees of precision. Those decimal points don't actually count. You don't have that data. You don't have that knowledge. The more estimated variables you have, the greater the error in the model.

Adding more complexity to your decision-making process gets you a worse answer. You're better off picking the single biggest thing or two. Ask yourself: What am I really good at, according to observation and people I trust, that the market values?

Those two variables alone are probably good enough. If you're good at it, you'll keep it up. You'll develop the judgment. If you're good at it and you like to do it, eventually people will give you the resources and you won't be afraid to take on accountability. So the other pieces will fall into place.

Product-market fit is inevitable if you're doing something you love and the market wants it.

Most advice is people giving you their winning lottery ticket numbers

The best founders listen to everyone but make up their own mind

Nivi: One of the tweets from the cutting-room floor was: "Avoid people who got rich quickly. They're just giving you their winning lottery ticket numbers."

Naval: This is generally true of most advice. It goes back to Scott Adams—systems not goals. If you ask a successful person what worked for them, they often read out the exact set of things that worked for them, which might not apply to you. They're just reading you their winning lottery ticket numbers.

It's a little glib. There is something to be learned, but you can't take their exact circumstance and map it onto yours. The best founders I know read and listen to everyone. But then they ignore everyone and make up their own mind.

They have their own internal model of how to apply things to their situation. And they do not hesitate to discard information. If you survey enough people, all of the advice will cancel to zero.

You have to have your own point of view. When something is sent your way, you have to quickly decide: Is it true? Is it true outside of the context of how that person applied it? Is it true in my context? And then, Do I want to apply it?

You have to reject most advice. But you have to listen to enough of it, and read enough of it, to know what to reject and what to accept.

Even in this podcast, you should examine everything. If something doesn't feel true to you, put it down. Set it aside. If too many things seem untrue, delete this podcast.

Advice offers anecdotes to recall later, when you get your own experience

Nivi: I think the most dangerous part of taking advice is that the person who gave it to you isn't going to be around to tell you when it doesn't apply any more.

Naval: I view the purpose of advice a little differently than most people. I view it as helping me have anecdotes and maxims that I can recall when I have my own direct experience and say, "Ah, that's what that person meant."

Ninety percent of my tweets are maxims that become mental hooks to remind me when I'm in that situation again.

Like, "Oh, I'm the one who tweeted, 'If you can't see yourself working with someone for life, then don't work with them for a day.'" As soon as I know I'm not going to be working with someone 10 years from now, then I have to start extricating myself from that relationship or investing less effort in it.

I use tweets to compress my own learnings. Your brain space is finite. You have finite neurons. You can think of these as pointers, addresses, mnemonics to help you remember deep-seated principles where you have the underlying experience to back it up.

If you don't have the underlying experience, then it reads like a collection of quotes. It's cool. It's inspirational for a moment. Maybe you make a nice poster out of it. But then you forget it and move on.

These are compact ways for you to recall your own knowledge.

When you're finally wealthy, you'll realize it wasn't what you were seeking in the first place

When you're wealthy, you'll realize it wasn't what you were seeking

Nivi: The last tweet on the topic of working for the long-term is: "When you're finally wealthy, you'll realize it wasn't what you were seeking in the first place. But that's for another day."

Naval: That's a multi-hour topic in and of itself. First of all, I thought it was a really clever way to end the whole thing. It disarms a whole set of people who say, "What's the point of getting rich?" There are a lot of people who like to virtue signal against the idea of wealth creation or making money.

It's also true. Yes, money will solve all your money problems. But it doesn't get you everywhere.

The first thing you realize when you've made a bunch of money is that you're still the same person. If you're happy, you're happy. If you're unhappy, you're unhappy. If you're calm and fulfilled and peaceful, you're still that same person. I know lots of very rich people who are extremely out of shape. I know lots of rich people who have really bad family lives. I know lots of rich people who are internally a mess.

A calm mind, a fit body and a house full of love must be earned

I would lean on another tweet that I put out. When I think back on it, I think it's my favorite tweet. It's not necessarily the most insightful. It's not necessarily the most helpful. It's not even the one I think about the most. But when I look at it, there's such a certain truth in there that it resonates. And that is: "A fit body, a calm mind, a house full of love. These things cannot be bought—they must be earned."

Even if you have all the money in the world, you can't have those three things. Jeff Bezos still has to work out. He still has to work on his marriage. And his internal mental state still very much won't be controlled by external events. It's going to be based on how calm and peaceful he is inside.

So I think those three things—your health, your mental health and your close relationships—are things you have to cultivate. They can bring you a lot more peace and happiness than any amount of money ever will.

Practical advice for a calmer internal state

How to get there is a tweetstorm I've been working on. I have probably 100 tweets on it. It's very hard to say anything on the topic without getting attacked from 50 different directions, especially these days on Twitter. So I've been hesitant to do it. I want to target it for a very specific kind of person.

There's a bunch of people who don't believe working on your internal state is useful. They're too focused on the external. And that's fine, there's nothing wrong with that. That's who the "How to Get Rich" tweetstorm is for. There's a bunch of people who believe the only thing worth working on is complete liberation. Like, you become the Buddha. They'll attack anything in the middle as being useless. That's fine, too. But most people aren't there.

I want to create a tweetstorm that offers practical advice for everyday people who want a calmer internal state. A set of understandings, realizations, half-truths and truths, that if you were to imbibe them properly—and, again, these are pointers to ideas you already have and experiences you already have—that if you keep these top of mind, slowly but steadily it will help you with certain realizations that will lead you to a calmer internal state. That's what I want to work on.

Fitness is another big one, I'm just not the expert there. There are plenty of good people on Twitter that who are better at fitness than me.

A lot of divorces happen over money, a lot of battles happen over internal anger

I think a loving household and relationships actually fall naturally out of the other things. If you have a calm mind and you've already made money, you should have good relationships. There's no reason why you shouldn't. A lot of divorces happen over money. Unfortunately, that's just the reality of it. Having money removes that part of it.

A lot of external battles happen because your internal state is not good. When you're naturally internally peaceful you're going to pick fewer fights. You're going to be more loving without expecting anything in return. That will take care of things on the external-relationship front.

Nivi: To summarize: Money solves your money problems. Money buys you freedom in the material world. And money lets you not do the things you don't want to do.

Naval: Yeah. To me the ultimate purpose of money is so you don't have to be in a specific place, at a specific time, doing anything you don't want to do.

Get rich quick schemes are just someone else getting rich off you

There are no get rich quick schemes

Nivi: We skipped one tweet because I wanted to cover all of the tweets on the topic of the long-term. The tweet we skipped: "There are no get rich quick schemes. That's just someone else getting rich off you."

Naval: This goes back to the world being an efficient place. If there's an easy way to get rich, it's already been exploited. There are a lot of people who will sell you ideas and schemes on how to make money. But they're always selling you some \$79.95 course or some audiobook or seminar.

Which is fine. Everyone needs to eat. People need to make a living. They might actually have really good tips. If they're giving you actionable, high-quality advice that acknowledges it's a difficult journey and will take a lot of time, then I think it's realistic.

But if they're selling you some get rich quick scheme—whether it's crypto or whether it's an online business or seminar—they're just making money off you. That's their get rich quick scheme. It's not necessarily going to work for you.

We don't have ads because it would ruin our credibility

One of the things about this whole tweetstorm and podcast is that we don't have ads. We don't charge for anything. We don't sell anything. Not because I don't want to make more money—it's always nice to make more money; we're doing work here—but because it would completely destroy the credibility of the enterprise. If I say, "I know how to get rich, and I'm going to sell that to you," then it ruins it.

When I was young, one of my favorite books on the topic was “How To Get Rich,” by Felix Dennis, the founder of Maxim Magazine. He had a lot of crazy stuff in there. But he had some really good insights too.

Whenever I read something by him or by GoDaddy founder Bob Parsons or Andrew Carnegie—people who are already very wealthy, and they clearly made their wealth in other fields, not by selling the how-to-get-rich line—they have a credibility. You just trust them.

They’re not trying to make money off of you. They’re obviously trying to win some status and some ego—you always have to have a motivation for doing something. But at least that’s a cleaner reason and why they’re probably not lying. They’re probably not fooling you. They’re not snowing you.

Every founder has to lie to every employee

At some level every founder has to lie to every employee of the company they have. They have to convince them, “It’s better for you to work for me than to do what I did and go work for yourself.”

I’ve always had a hard time with that.

The only honest way to do this, in my opinion, is to tell the entrepreneurs I recruit: “You’re going to be entrepreneurial in this company, and the day you’re ready to start your own next thing, I’m going to support you. I’m never going to get in the way of you starting a company. But this can be a good place for you to learn how to build a good team and build a good culture; how to find product-market fit; how to perfect your skills; and to meet some amazing people while you figure out exactly what it is you’re going to do. Because positioning, timing and deliberation are very important when starting a company.”

What I’ve never been able to do is to look them in the face and say, “You must be at your desk by 8 a.m.” Because I’m not going to be at my desk by 8 a.m. I want my freedom. I’ve never been able to say to them, “You’re great at being a director today, and you’ll be a VP tomorrow,” putting them into that cold career path track. Because I don’t believe in it myself.

Anyone giving advice on how to get rich should have made their money elsewhere

If anyone is giving advice on how to get rich and they’re also making money off of it, they should have made their money elsewhere. You don’t want to learn how to be fit from a fat person. You don’t want to

learn how to be happy from a depressed person. So, you don't want to learn how to be rich from a poor person. But you also don't want to learn how to be rich from somebody who makes their money by telling people how to be rich. It's suspect.

Nivi: Any time you see somebody who's gotten rich following some guru's advice on getting rich, remember that in any random process, if you run it long enough and if enough people participate in it, you will always get every single possible outcome with probability one.

Naval: There's a lot of random error in there. This is why you have to absolutely and completely ignore business journalists and economist academics when they talk about private companies.

I won't name names, but when a famous economist rails on Bitcoin, or when a business journalist attacks the latest company that's IPO'ing, it's complete nonsense. Those people have never built anything. They're professional critics. They don't know anything about making money. All they know is how to criticize and get pageviews. And you're literally becoming dumber by reading them. You're burning neurons.

I'll leave you with a quote from Nassim Taleb that I liked. He said, "To become a philosopher king, start with being a king, not being a philosopher."

Nivi: I'm glad you brought up Taleb, because I was going to finish this by saying: remember the title of his first book, "Fooled By Randomness."

Naval: One of the reasons we're a little vague in this podcast is because we're trying to lay down principles that are timeless, as opposed to giving you the winning lottery ticket numbers from yesterday.

Figure out what you're uniquely good at, and apply as much leverage as possible

Figure out what you're uniquely good at and apply as much leverage as possible

Nivi: You summarized this entire tweetstorm with two words: "Productize yourself."

Naval: Productize has specific knowledge and leverage. Yourself has uniqueness and accountability. Yourself also has specific knowledge. So you can combine all of these pieces into these two words.

If you're looking towards the long-term, you should ask yourself, "Is this authentic to me? Is it myself that I'm projecting?" And then, "Am I productizing it? Am I scaling it? Am I scaling with labor or capital or code or media?" It's a very handy, simple mnemonic.

What is this podcast? This is a podcast called Naval. I'm literally productizing myself with a podcast.

Nivi: You want to figure out what you're uniquely good at—or what you uniquely are— and apply as much leverage as possible. So making money isn't even something you do. It's not a skill. It's who you are, stamped out a million times.

Find hobbies that make you rich, fit and creative

Naval: Making money should be a function of your identity and what you like to do. Another tweet I really liked was, "Find three hobbies: One that makes you money, one that keeps you fit, and one that makes you creative."

I would change that slightly. I would say: One that makes you money, one that makes you fit, and one that makes you smarter. So in my case, my hobbies would be reading and making money, as I love working with startups, investing in them, brainstorming them, starting them. I love the ideation and initial creation phase around startups.

On the hobby that keeps you fit, I don't really have one. The closest thing I have is yoga, but that's where I sort of fell apart. I think people who, early in life, discover something like surfing or swimming or tennis or some kind of a sport they continue doing throughout most of their life are very lucky, because they found a hobby that will make them fit.

You have to stick your neck out and be willing to fail publicly

Accountability means letting people criticize you

Nivi: We finished discussing the tweetstorm. We're going to spend some time on Q&A and discussing tweets that didn't make it into the "How to Get Rich" tweetstorm. My first question: What are some common failures or things people typically do wrong when they try to apply this advice?

Naval: A lot of people don't understand what specific knowledge is or how to "obtain" it. People don't understand what accountability entails. They think accountability means being successfully accountable. No—it means you have to stick your neck out and fail publicly. You have to be willing to let people criticize you.

One of the reasons I'm less active on Twitter lately is because every tweet summons an army of nitpickers and haters. It gets exhausting. You have to learn to ignore them, or you won't survive on Twitter.

A lot of people try to reconcile this by asking, "Should I quit my 9-to-5 job or not?" That can be a hard decision. You don't need to go to that extreme. You can start applying accountability, leverage and specific knowledge within your existing career. You don't necessarily need to fork off and do something else completely different.

The most interesting parts should be the ones you disagree with

People will use my advice as a way to agree and disagree with their existing biases. They'll say, "I agree with that part," and, "That part you're completely wrong." The most interesting tweets should be the ones you disagree with—because clearly I've proven I know a few things. If you disagree with it, maybe that's an area where you can improve your thinking. I improve my thinking all the time.

In this tweetstorm I put down the minimum-viable principles. I shared only a small slice of what I've learned about how to make money; because 90% of it is suspect.

I put down the bedrock, the stuff I'm sure about. I have not yet seen a tweet successfully contradicting anything in this tweetstorm that would cause me to say, "I got that one wrong."

Get the free leverage that's available in tech

Some people will say, "This only applies to tech entrepreneurs." I disagree. The real estate example was a good one in that regard.

Technology drives leverage—so I’m going to push you in a tech direction to get that free leverage. Obviously, this message is being delivered through the Internet, so it’s going to have a pro-Internet bias.

Don’t refuse to do things just because others can’t do them

Some people believe it’s unfair to do anything with the opportunities they have because others don’t have the same opportunities. With a defeatist attitude like that, why even get out of bed in the morning? Ninety percent of people are dead.

Many people live on a dollar or less a day. Do you? No. You play the hand you’re dealt to the best of your ability. Then you can take the winnings—the pot from that hand—and do whatever you want with it to fix the world.

But if you refuse to do things just because others can’t do them, you are living in denial. It’s an excuse to do nothing.

Realize your philanthropic vision by running a business

Others believe wealth creation is fundamentally at odds with an environmentally healthy planet. They view it as a giant zero-sum game. That’s a false narrative, too. Elon Musk is not playing a zero-sum game with the environment; there are plenty of entrepreneurs like him.

There is a word environmentalists love: sustainability. If nothing else, for-profit businesses are financially sustainable. You can do a B Corporation, which has a dual mission.

Many non-profit efforts would be better off as for-profit companies. They wouldn’t have to beg for grants. They would be financially sustainable. Some great founders realize their philanthropic visions by running a business.

But we will have to make sacrifices and take on more risk

This advice is for anybody who wants to be entrepreneurial

Nivi: Who is this advice targeted to? Is it for my Lyft driver? Is it for an Internet entrepreneur? Is it for somebody who wants to start a YouTube channel?

Naval: Because it comes from someone who's steeped in Silicon Valley and tech companies, it's always going to have a bias towards that.

But I think it's good for anybody who wants to be entrepreneurial. Anybody who wants to control their own life. Anybody who wants to deterministically and reliably improve their ability to create wealth over time, is patient, and is looking at the long haul.

If you're 80 years old, retired and running out of energy, it's probably best to stay retired. But there are 80-year-olds who have a lot of energy, who want to do new things and live for the future.

Obviously this can apply very easily to a young person. I would say 9 or 10 years old and up.

Midlife can be the most fruitful time to apply this advice

The most difficult one is probably midlife. When we're in our 30s, 40s and 50s, we already have a lot invested. We have a lot of obligations. Those are the years we're earning; people are relying on us. We don't want to change, because we don't want to admit defeat.

But that's when it actually can be the most fruitful. It may be the most difficult pivot: You have a 9-to-5 job; you have a family relying on you.

It may seem like the things in this podcast are far too idealistic, but maybe it can inform your weekend projects. Maybe it can inform your approach to education; for example, if you're taking an online course at night. Maybe it can inform what roles you take on at your current company, because they move you closer and closer to points of leverage, points of judgment or points where you're naturally talented, and you're able to be more authentic. It might cause you to take on more accountability.

Even if applied piecemeal, these principles can guide you—regardless of what stage of life you are in, short of retirement. If you're retired, test them to see if they're true and then teach them to your kids or grandkids.

There are many different ways to participate. It should apply to almost everybody who has a complete body, sound mind, and is looking to work.

Look up the value chain to find leverage

Nivi: One way to apply this advice is to look at who is getting leverage off of the work that you're doing. Look up the value chain—at who's above you and who's above them—and see how they are taking advantage of the time and work you're doing and how they're applying leverage.

People naturally do this because they want to move up the corporate ladder; but that's mostly about managing other people. You want to manage more capital, products, media and community.

People think about moving up the ladder in their organization. But they don't often think about moving to a different organization or creating their own company to get more leverage.

You will do better in a small organization

Naval: In general, *ceteris paribus*—fancy Latin words for “all other things equal”—you will do better in a smaller organization than a larger one.

You will have more accountability, and your work will be more visible. You're more likely to be able to try different things, which can help you discover the thing you are uniquely good at. People will be more likely to give you leverage through battlefield promotions. You'll have more flexibility. There will be more authenticity in how the company operates.

Here is a good progression for a career: Start in a large company and progressively move to smaller and smaller ones. It's very hard to go from a small company to a larger company. Larger companies tend to be more about politics than merit; they're more stable but less innovative.

The goal is that we are all working for ourselves

The long-term goal is that we are all wealthy and working for ourselves. The people working for us are essentially robots. Today that's software robots executing code in data centers. Tomorrow it could be delivery bots, flying bots and mechanical bots—and drones—that are carrying things around.

This goes back to the idea that the best relationships are peer relationships. If there's someone above you, that's someone to learn from. If you're not learning from them and improving, nobody should be above you.

If there's somebody below you, it's because you're teaching them and enabling them. If you're not doing that, then get a robot; you don't need a human below you.

This is utopian and still a long way off, but in the not-too-distant future anybody who wants to work for themselves will be able to do it.

You may have to make sacrifices and take on more risk. You may have to take on more accountability and live with less steady income. But more and more I think younger people are realizing that if they're going to work, they're going to work for themselves.

If you cut fair deals, you will get paid in the long run

Ethics isn't something you study; it's something you do

Nivi: In the "How to Get Rich" tweetstorm you listed things you suggest people study, like programming, sales, reading, writing and arithmetic. One of the items that ended up on the cutting-room floor was ethics, which you also suggest people study.

Naval: I was going to put that out as a concession to people who believe making money is evil and that the only way to make it is to be evil. But then I realized ethics is not necessarily something you study. It's something you think about—and something you do.

Everyone has a personal moral code. Where we get our moral code differs for everybody. It's not like I can point you to a textbook. I can point you to some Roman or Greek text, but that's not suddenly going to make you ethical.

There's the Golden Rule: "Do unto others as you would have them do unto you." Or there's Nassim Taleb's Silver Rule, which is, "Don't do unto others what you don't want them doing unto you."

Trust leads to compounding relationships

Once you've been in business long enough, you will realize how much of it is about trust. It's about trust because you want to compound interest. You want to work with trustworthy people for long periods of time without having to reevaluate every discussion or constantly look over your shoulder.

Over time you will gravitate to working with certain kinds of people. Similarly, those people will gravitate to working with other ethical people.

Being ethical attracts other long-term players

Acting ethically turns out to be a selfish imperative. You want to be ethical because it attracts other long-term players in the network. They want to do business with ethical people.

If you build a reputation for being ethical, people eventually will pay you just to do deals through you. Your involvement will validate deals and ensure they get done; because you wouldn't be involved with low-quality stuff.

In the long-run, being ethical pays off—but it's the very long run. In the short-run, being unethical pays off, which is why so many people go for it. It's short-term greedy.

Being ethical is long-term greedy

You can be ethical simply because you're long-term greedy. I can even outline a framework for different parts of ethics just based on the idea of long-term selfishness.

For example, you want to be honest because it leaves you with a clear mind. You don't want two threads running in your head, one with the lies you tell—and now have to keep track of—and the other with the truth. If you are honest, you only have to think about one thing at a time, which frees up mental energy and makes you a clearer thinker.

Also, by being honest you're rejecting people who only want to hear pretty lies. You force those people out of your network. Sometimes it's painful, especially with friends and family. But over the long-term you create room for the people who like you exactly the way that you are. That is a selfish reason to be honest.

If you cut fair deals, you will get paid in the long run

Negotiations offer another good example. If you're the kind of person who always tries to get the best deal for yourself, you will win a lot of early deals and it will feel very good.

On the other hand, a few people will recognize that you're always scrabbling and not acting fairly, and they will tend to avoid you. Over time those are the people who end up being the dealmakers in the network. People go to them for a fair shake or to figure out what's fair.

If you cut people fair deals, you won't get paid in the short-term. But over the long-term, everybody will want to deal with you. You end up being a market hub. You have more information. You have trust. You have a reputation. And people end up doing deals through you in the long-run.

A lot of wisdom involves realizing long-term consequences of your actions. The longer your time horizon, the wiser you're going to seem to everybody around you.

Envy can give you a powerful boost, or it can eat you alive

Suffering through the wrong thing can motivate you to find the right thing

Nivi: Do you want to tell us about jobs you had growing up and the one that kicked off your fanatical obsession with creating wealth?

Naval: This gets a little personal, and I don't want to humble-brag. There was a thread going around Twitter—Name Five Jobs You've Held—and every rich person on there was signaling how they've held normal jobs. I don't want to play that game.

I've had menial jobs. There are people who had it worse than me and people who had it better than me.

At one point in college I was washing dishes in the school cafeteria and said, "F this. I hate this. I can't do this anymore." I sweet-talked my way into a teaching assistant job for a computer science professor, even though I was completely unqualified. The job forced me to learn computer algorithms, so I could TA the rest of the course.

So my desire to learn computer algorithms came out of the suffering I experienced washing dishes—not that there's anything wrong with washing dishes; it just wasn't for me.

I had an active mind. I wanted to make money and earn a living through mental activities, not through physical activities. Sometimes it takes suffering through the wrong thing to motivate you to find the right thing.

Being a lawyer was not what I was meant to do

Back in the day I had a prestigious internship at a big New York City law firm. I basically got fired for surfing Usenet.

This was before the Internet was a big thing. Usenet hosted newsgroups, and it was the only the only thing keeping me from being completely bored. I was an overpaid intern wearing a suit and tie. I got to hang out in the conference room and make photocopies when lawyers needed them.

I was bored out of my skull. This was pre-iPhone (thank God for Steve Jobs for saving us all from unending boredom). I used to read The Wall Street Journal or anything I could get my hands on. I would've read the back of a brochure to keep from going insane, because listening to a bunch of corporate lawyers discuss how to optimize details of a contract is really dull.

They wanted me to sit there quietly and not read the paper. They got mad and said, "That's rude. That's misbehavior."

I got called up and reprimanded a bunch of times. I was finally terminated—sent home in shame from my prestigious internship, destroying my chance to go to law school.

I was unhappy... for all of an hour. Ultimately, it's one of the best things that ever happened to me. Otherwise, I would have ended up a lawyer. Not that I have anything against lawyers; it's just not what I was meant to do.

Envy can be useful or it can eat you alive

Nivi: You mentioned a catering job that kicked off your obsession with wealth.

Naval: That was an envy thing. When I was in high school, I needed a job to pay for my first semester of college.

It was the summer of 1990 or 1991. This was the Bush Senior recession—if anyone listening was alive back then to remember it—so it was actually really hard to get a job.

I ended up working for a catering company serving Indian food. One day, I had to serve at a birthday party for a kid in my school. So I was out there serving food and drinks to all of my classmates. That was incredibly embarrassing. I wanted to hide away and die right there.

But you know what? It's all part of the plan. It's all part of the motivation. If that didn't happen, I probably wouldn't be as motivated or as successful. It's all fine. It was definitely a strong motivator.

In that sense, envy can be useful. Envy also can eat you alive if you let it follow you around your entire life. But there are points in your life when it can be a powerful booster rocket.

If you think and act like an owner, it's only a matter of time until you become an owner

A principal is an owner; an agent is an employee

Nivi: We spoke earlier about picking a business model that has leverage from scale economies, network effects and zero marginal cost of replication. There were a few other ideas on the cutting-room floor that I want to go through with you. The first one is the principal-agent problem.

Naval: So mental models are all the rage. Everyone's trying to become smarter by adopting mental models. I think mental models are interesting, but I don't think explicitly in terms of mental-model checklists. I know Charlie Munger does, but that's just not how I think.

Instead, I tend to focus on the few lessons I've learned over and over in life that I think are incredibly important and seem to apply almost universally. One that keeps coming up from microeconomics—because as we've established, macroeconomics is not really worth spending time on—is what's called the principal-agent problem.

In this case it's a principal, who is a person; rather than a principle that you would follow. A principal is an owner. An agent works for the owner, so you can think of an agent as an employee. The difference between a founder and an employee is the difference between a principal and an agent.

A principal's incentives are different than an agent's incentives

I can summarize the principal-agent problem with a famous quote attributed to Napoleon or Julius Caesar:

"If you want it done, Go. If not, Send."

Which is to say: If you want to do something right, do it yourself; because other people just don't care enough.

Now, the principal-agent problem pops up everywhere. In microeconomics, they try to characterize it this way: The principal's incentives are different than the agent's incentives, so the owner of the business wants what is best for the business and will make the most money. The agent generally wants whatever will look good to the principal, or might make them the most friends in the neighborhood or in the business, or might make them personally the most money.

You see this a lot with hired-gun CEOs running public companies, where the ownership of the public company is distributed so widely that there's no principal remaining. Nobody owns more than 1% of the company. The CEO takes charge, stuffs the board with their buddies and then starts issuing themselves low-price stock options, or doing a lot of stock buybacks because their compensation is based directly tied to the stock price.

If you can work on incentives, don't work on anything else

Agents have a way of hacking systems. This is what makes incentive design so difficult. As Charlie Munger says, if you could be working on incentives, don't work on anything else.

Almost all human behavior can be explained by incentives. The study of signaling is seeing what people do despite what they say. People are much more honest with their actions than they are with their words. You have to get the incentives right to get people to behave correctly. It's a very difficult problem because people aren't coin-operated. The good ones are not just looking for money—they're also looking for things like status and meaning in what they do.

As a business owner you are always going to be dealing with the principal-agent problem. You're always going to be trying to figure out: How do I make this person think like me? How do I incentivize them? How do I give them founder mentality?

Only founders can fully appreciate the importance of a founder mentality and just how difficult and gnarly the principal-agent problem is.

When you do deals, it's better to have the same incentives

If you are a principal, you want to spend a lot of your time thinking about this problem. You want to be generous with your top lieutenants—in terms of ownership and incentives—even if they don't necessarily realize it; because over time they will and you want them to be aligned with you.

When you do business deals, it's better to have an aligned partnership where you both have the same incentives than a partnership where you have the advantage in the deal. Because eventually the other person will figure it out and the partnership will fall apart. Either way, it's not going to be one of those things that you can invest in and enjoy the benefits of compound interest over decades.

If you're an employee, your most important job is to think like a principal

Finally, if you're in a role where you're an agent—you're an employee—then your most important job is to think like a principal. The more you can think like a principal, the better off you're going to be long-term. Train yourself how to think like a principal, and eventually you will become a principal. If you align

yourself with a good principal, they will promote you or empower you or give you accountability or leverage that may be way out of proportion to your relatively menial role.

I'm always impressed by founders who promote young people through the ranks and allow them to skip multiple levels despite their lack of experience. Invariably it happens because this agent—who's way deep down in the organization—thinks like a principal.

If you can hack your way through the principal-agent problem, you'll probably solve half of what it takes to run a company.

Nivi: The reason I asked about this one first is because I feel like I never see the principal-agent problem in my work. I tend to work in small teams where everybody is highly economically aligned, and the people have been filtered for a commitment to the mission, and everybody else who doesn't work out moves on to another role elsewhere.

Naval: These are all heuristics that you have designed to avoid having to deal with the single biggest problem in management.

Deal with small firms to avoid the principal-agent problem

Another example of a heuristic that helps you route around the principal-agent problem is to deal with the smallest firms possible. For example, when I hire a lawyer or a banker or even an accountant to work on my deals, I've become very cognizant about the size of the firm. Bigger firms—all other things being equal—are generally worse than small ones.

Yes, the big firm has more experience. Yes, they have more people. Yes, they have a bigger brand. But you'll find the principal and the agent are highly separated. Very often the principal will sell you and convince you to work with the firm, but then all the work will be done by an agent who simply doesn't care as much. You end up getting substandard service.

I prefer to work with boutiques. My ideal law firm is a law firm of one. My ideal banker is a solo banker. Now, you're making other sacrifices and trade-offs in terms of that person's resources—and you are betting big on that person. But you've got one throat to choke. There's no one else to point fingers at; there's nowhere to run. The accountability is extremely high.

If you are an agent, the best way to operate is to ask, “What would the founder do?” If you think like the owner and you act like the owner, it’s only a matter of time until you become the owner.

Don’t ruin your reputation or get wiped to zero

Don’t bet everything on one big gamble

Nivi: Let’s chat about the Kelly criterion.

Naval: The Kelly criterion is a popularized mathematical formulation of a simple concept. The simple concept is: Don’t risk everything. Stay out of jail. Don’t bet everything on one big gamble. Be careful how much you bet each time, so you don’t lose the whole kitty.

If you’re a gambler, the Kelly criterion mathematically formulates how much you should wager per hand, even if you have an edge—because even when you have an edge, you can still lose. Let’s say you have 51-to-49 edge. Every gambler knows not to bet the whole kitty on that 51-to-49 edge—because you could lose everything and won’t get to come back to the average.

Nassim Taleb famously talks about ergodicity, which is a fancy word for a simple concept: What is true for 100 people on average isn’t the same as one person averaging that same thing 100 times.

Ruining your reputation is the same as getting wiped to zero

The easiest way to see that is with Russian roulette. Say six people play Russian roulette one time each, and each winner gets \$1 billion. One person ends up dead and five people get \$1 billion. Compare that to one person playing Russian roulette six times with the same gun. They are never going to end up a billionaire—they will be dead and worth zero. So risk-taking—especially when the averages that are calculated across large populations—is not always rational.

The Kelly criterion helps you avoid ruin. The number one way people get ruined in modern business is not by betting too much; it’s by cutting corners and doing unethical or downright illegal things. Ending up in an orange jumpsuit in prison or having a reputation ruined is the same as getting wiped to zero—so never do those things.

People who can't communicate can cooperate by anticipating the other person's actions

Use social norms to cooperate when you can't communicate

Nivi: Let's talk about Schelling points.

Naval: The Schelling point is a game theory concept made famous by Thomas Schelling in his book, *The Strategy of Conflict*, which I recommend.

It's about multiplayer games where people respond based on what they think the other person's response will be. He came up with a mathematical formalization to answer: How do you get people who cannot communicate with each other to coordinate?

Suppose I want to meet with you, but I don't tell you where or when to meet. You also want to meet with me, but we can't communicate. That sounds like an impossible problem to solve—we can't do it. But not quite.

You can use social norms to converge on a Schelling point. I know you're rational and educated. And you know I'm rational and educated. We're both going to start thinking.

When will we meet? If we have to pick an arbitrary date, we'll probably pick New Year's Eve. What time will we meet? Midnight or 12:01 a.m. Where will we meet? If we're Americans, the big meeting spot is probably New York City, the most important city. Where in New York City will we meet? Probably under the clock at Grand Central Station. Maybe you end up at the Empire State Building, but not likely.

You can find Schelling points in business, art and politics

There are many games—whether it's business or art or politics—where you can find a Schelling point. So you can cooperate with the other person, even when you can't communicate.

Here's a simple example: Suppose two companies are competing heavily and hold an oligopoly. Let's say the price fluctuates between \$8 and \$12 for whatever the service is. Don't be surprised if they converge on \$10 without ever talking to each other.

Improve your leverage by turning short-term relationships into long-term ones

Pareto optimal solutions require a trade-off to improve any criterion

Nivi: Do you want to talk about Pareto optimal?

Naval: Pareto optimal is another concept from game theory, along with Pareto superior.

Pareto superior means something is better in some ways while being equal or better in other ways. It's not worse in any way. This is an important concept when you're negotiating. If you can make a solution Pareto superior to where it was before, you will always do that.

Pareto optimal is when the solution is the best it can possibly be and you can't change it without making it worse in at least one dimension. There is a hard trade-off from this point forward.

These are important concepts to understand when you're involved in a big negotiation.

Negotiations are won by whoever cares less

I generally say, though: "Negotiations are won by whoever cares less." Negotiation is about not wanting it too badly. If you want something too badly, the other person can extract more value from you.

If someone is taking advantage of you in a negotiation, your best option is to turn it from a short-term game into a long-term game. Try to make it a repeat game. Try to bring reputation into the negotiation. Try to include other people who may want to play games with this person in the future.

An example of a high-cost, low-information single-move game is having your house renovated.

Contractors are notorious for overbooking, ripping people off, and being unaccountable. I'm sure contractors have their own side to it: "The homeowner has unreasonable demands." "We found

problems.” “The homeowner doesn’t want to pay for it.” “They don’t understand; they’re low-information buyers.”

It’s an expensive transaction. Historically it’s been very hard to find good contractors; and the contractor has little information on the homeowner.

Convert single-move games to multi-move games

So you try to go through friends. You try to find people with good reputations. You’re converting an expensive single-move game with a high probability of cheating on both sides into a multi-move game.

One way to do that is to say: “Actually, I need two different projects done. The first project we’ll do together, and based on that I’ll decide if we do the second project.”

Another way is to say: “I’m going to do this project with you, and I have three friends who want projects done who are waiting to see the outcome of this project.”

Another way is to write a Yelp or Thumbtack review—especially if the contractor operates within a community and wants to protect their reputation in that community.

These are all ways to turn a single-move game into a longer term game and get past a position of poor negotiating leverage and poor information.

Life gets a lot easier when you know someone’s got your back

Mutual trust makes it easy to do business

Relationships offer a good example of compound interest. Once you’ve been in a good relationship with somebody for a while—whether it’s business or romantic—life gets a lot easier because you know that person’s got your back. You don’t have to keep questioning.

If I'm doing a deal with someone I've worked with for 20 years and there is mutual trust, we don't have to read the legal contracts. Maybe we don't even need to create legal contracts; maybe we can do it with a handshake. That kind of trust makes it very easy to do business.

If Nivi and I start another company and things aren't working out, I know we're both going to be extremely reasonable about deciding what to do—how to exit or shut it down. Or if we're scaling it, how to bring in new people. We have mutual trust, and that allows us to start businesses more easily and compounds the effect.

The most under-recognized reason startups fail is because the founders fall apart.

A startup is so difficult to pull off, so removing potential friction points between founders can be the difference between success and failure.

It's better to have a few compounding relationships than many shallow ones

Nivi: There are a couple of non-intuitive things about compounding. The first is that most of the benefits come at the end, so you may not see huge benefits up front.

Sam Altman wrote, "I always want it to be a project that, if successful, will make the rest of my career look like a footnote." Again, most of the benefits of compounding come at the end.

Another thing that's non-intuitive about compounding: It's better to have a few deep compounding relationships than many shallow, non-compounding relationships.

It takes just as much effort to create a small business as a large one

Naval: One thing about business that people don't realize: it takes just as much effort to create a small business as it does to create a large one.

Whether you're Elon Musk or the guy running three Italian restaurants in town, you're working 80 hours a week; you're sweating bullets; you're hiring and firing people; you're trying to balance the books; it's highly stressful; and it takes years and years of your life.

In one case, you get companies worth \$50-\$100 billion and everyone's adulation. In the other, you might make a little bit of money and you've got some nice restaurants. So think big.

You can charge people for extras based on their propensity to pay

Price discrimination is a technique for charging certain people more

Nivi: Are there any other microeconomic concepts, outside of zero marginal cost of replication and scale economies, that are important to understand?

Naval: Price discrimination is important. It means you can charge people based on their propensity to pay.

Now, you can't charge people different amounts just because you don't like them. You have to offer them something extra. But it has to be something rich people care about.

Business-class seats routinely cost five or 10 times more than economy seats. But it costs the airline much less—maybe two or three times more than a standard seat—to provide perks like wider seats, more legroom and free drinks.

Rich people and large enterprises are willing to pay more

Price discrimination works because rich people are willing to pay more. You just have to give them the extra little things they need to signal they're rich or that little bit of comfort they want.

A lot of enterprise software companies use price discrimination, especially with freemium products. The free or low-price version will do almost everything you want. But if you want the version that's extra secure or hosted on your site or has multiple-user administration so the IT person can monitor everything, you'll find yourself paying 10 or 100 times more.

People are willing to pay more than what companies charge

Consumer surplus is the extra value you get when you pay less than you were willing

Naval: Consumer surplus and producer surplus are important concepts. Consumer surplus is the excess value you get from something when you pay less than you were willing to pay.

I get a lot of joy out of my morning Starbucks coffee. Obviously I've made some money. So if my coffee cost \$20, I would pay it.

But Starbucks doesn't know that. They can't price the coffee at \$20 just for me, because they're selling the exact same product to others. So I'm getting a lot of consumer surplus out of the coffee.

All businesses generate consumer surplus. It's a good thing to keep in mind when someone's harping on about how evil companies are. Amazon might be a trillion-dollar company, but I'll bet they're generating trillions of dollars in consumer surplus through people's willingness to pay for convenience. A lot of people are willing to pay more than what Amazon charges.

See what future income is worth today by applying a discount to its future value

Figure out what future income is worth today by applying a discount rate

Nivi: Let's talk about net present value (NPV).

Naval: Net present value is when you say, "That stream of payments I'm going to get in the future — what's it worth today?"

Here's a common example: You're joining a startup and getting stock options, and the founder says, "This company is going to be worth \$1 billion, and I'm giving you 0.1% of the company; therefore, you're getting \$1 million worth of stock."

The founder is negotiating based on what it's going to be worth in the future. You have to figure out what it's worth today by applying a discount rate, or an interest rate, that accounts for the massive risk startups face.

You'll end up with the amount the company is actually worth today. That's the price at which a venture capitalist would invest in the company.

If the founder recently raised a round at a \$10 million valuation, then the company's only worth 1% of what the founder says it will be worth. So your \$1 million package is actually worth \$10,000. You should get very comfortable doing rough net present value calculations in your head.

Externalities let you account for the true cost of products by including hidden costs

Nivi: What's a mispriced externality? You mentioned it on a previous episode.

Naval: An externality is where there's an additional cost imposed by whatever product is being produced or consumed, that's not accounted for in the price of the product. This can happen for many reasons. Sometimes you can fix it by putting the cost back into the price.

Some of the most ardent critics of capitalism argue it's destroying the environment. If you throw away capitalism because it's destroying the environment, then guess what—we're all headed back to pre-industrial times. That's not going to be a good thing.

Pricing externalities properly is more effective than feel-good measures

Because the environment is finite and precious, we have to price it properly and fold that back into the cost of products and services.

If people are wasting water, releasing hydrocarbons into the atmosphere or polluting in other ways, society should charge them what it costs to clean up the pollution and return the environment to a pristine state. Perhaps that price has to be very, very, very high.

If you raise the price high enough, you'll knock out pollution. That's much better than feel-good measures like banning plastic bags or restricting showers during a drought.

Properly pricing externalities can save resources in a tremendous way

California likes to run declarations and ads to scare people into avoiding showers during droughts. It would be better to raise the price of fresh water. The average consumer might pay a few pennies more for a shower, but the almond farmers—who consume a lot of water—will cut back; and almond farming may move to a part of the country where water is more abundant.

Properly pricing externalities can save resources in a tremendous way. It's a good framework to use when you want to do things like save the environment, rather than doing feel-good things that won't actually amount to anything.

If you have to work a “normal job,” take on accountability to build your specific knowledge

Nivi: A common question we get: “How do I find the time to start investing in myself? I have a job.”

You have to rent your time to get started

In one of the tweets from the cutting room floor, you wrote: “You will need to rent your time to get started. This is only acceptable when you are learning and saving. Preferably in a business where society does not yet know how to train people and apprenticeship is the only model.”

Naval: Try to learn something that people haven't quite figured out how to teach yet. That can happen if you're working in a new and quickly expanding field. It's also common in fields that are circumstantial—where the details matter and it's always moving. Investing is one of those fields; so is entrepreneurship.

Chief of staff for a founder is one of the most coveted jobs for young people starting out in Silicon Valley. The brightest kids will follow an entrepreneur around and do whatever he or she needs them to do.

In many cases, the person is way overqualified. Someone with multiple graduate degrees might be running the CEO's laundry because that's the most important thing at the moment.

At the same time, that person gets to attend the most important meetings. They are privy to all the stress and theatrics, the fundraising decks and the innovation—knowledge that can only come from being in the room.

Coming out of college, Warren Buffett wanted to work for Benjamin Graham to learn to be a value investor. Buffett offered to work for free, and Graham responded, “You’re overpriced.” What that means is you have to make sacrifices to take on an apprenticeship.

Find the part of the job with the steepest learning curve

If can’t learn in an apprenticeship model because you need to make money, try to be innovative in the context of your job. Take on new challenges and responsibilities. Find the part of the job with the steepest learning curve.

You want to avoid repetitive drudgery—that’s just biding time until your job is automated away.

If you’re a barista at the coffee shop, figure out how to make connections with the customers. Figure out how to innovate the service you offer and delight the customer. Managers, founders and owners will take notice.

Develop a founder mentality

The hardest thing for any founder is finding employees with a founder mentality. This is a fancy way of saying they care enough.

People will say, “Well, I’m not the founder. I’m not being paid enough to care.” Actually, you are: The knowledge and skills you gain by developing a founder mentality set you up to be a founder down the line; that’s your compensation.

You can get a lot out of almost any position. You just have to put a lot into it.

Accountability is something you can take on immediately

Nivi: We’ve discussed accountability, judgment, specific knowledge and leverage. If I’m working a “normal” job, is specific knowledge the one I should focus on?

Naval: Judgment takes experience. It takes a lot of time to build up. You have to put yourself in positions where you can exercise judgment. That'll come from taking on accountability.

Leverage is something that society gives you after you've demonstrated judgment. You can get it faster by learning high-leverage skills like coding or working with the media. These are permissionless leverage. This is why I encourage people to learn to code or produce media, even if it's just nights and weekends.

So, judgment and leverage tend to come later. Accountability is something you can take on immediately. You can say, "Hey, I'll take charge of this thing that nobody wants to take charge of." When you take on accountability, you're also publicly putting your neck on the chopping block—so you have to deliver.

You build specific knowledge by taking accountability for things that other people don't know how to do. Perhaps they're things you enjoy doing or are naturally inclined towards doing anyway.

If you work in a factory, the hardest thing may be raising capital to keep the factory running. Maybe that's what the owner is always stressed out about.

You might notice this and think, "I'm good at balancing my checkbook and have a good head for numbers; but I haven't raised money before." You offer to help and become the owner's sidekick solving their fundraising problem. If you have a natural aptitude and take on accountability, you can put yourself in a position to learn quickly. Before long, you'll become the heir apparent.

Early on, find things that interest you and allow you to take on accountability. Don't worry about short-term compensation. Compensation comes when you're tired of waiting for it and have given up on it. This is the way the whole system works.

If you take on accountability and solve problems on the edge of knowledge that others can't solve, people will line up behind you. The leverage will come.

Specific knowledge can be timely or timeless

There are two forms of specific knowledge: timely and timeless.

If you become a world-class expert in machine learning just as it takes off and you got there through genuine intellectual interest, you're going to do really well. But 20 years from now, machine learning may be second hat; the world may have moved on to something else. That's timely knowledge.

If you're good at persuading people, it's probably a skill you picked up early on in life. It's always going to apply, because persuading people is always going to be valuable. That's timeless knowledge.

Now, persuasion is a generic skill—it's probably not enough to build a career on. You need to combine it in a skill stack, as Scott Adams writes. You might combine persuasion with accounting and an understanding of semiconductor production lines. Now you can become the best semiconductor salesperson and, later on, the best semiconductor company CEO.

Timeless specific knowledge usually can't be taught, and it sticks with you forever. Timely specific knowledge comes and goes; but it tends to have a fairly long shelf life.

Technology is a good place to find those timely skills sets. If you can bring in a more generic specialized knowledge skill set from the outside, then you've got gold.

Technology is an intellectual frontier for gaining specific knowledge

Nivi: There were a couple other tweets from the cutting-room floor on this topic. The first: "The technology industry is a great place to acquire specific knowledge. The frontier is always moving forward. If you are genuinely intellectually curious, you will acquire the knowledge ahead of others."

Naval: Danny Hillis famously said technology is everything that doesn't work yet. Technology is around us everywhere. The spoon was technology once; fire was technology once. When we figured out how to make them work, they disappeared in the background and became part of our everyday lives.

Technology is, by definition, the intellectual frontier. It's taking things from science and culture that we have not figured out how to mass produce or create efficiently and figuring out how to commercialize it and make it available to everybody.

Technology will always be a great field where you can pick up specific knowledge that is valuable to society.

If you don't have accountability, do something different

Nivi: Here's another tweet from the cutting-room floor related to accountability: "Companies don't know how to measure outputs, so they measure inputs instead. Work in a way that your outputs are visible and measurable. If you don't have accountability, do something different."

Naval: The entire structure of rewarding people comes from the agricultural and industrial ages, when inputs and outputs matched up closely. The amount of hours you put into doing something was a reliable proxy for what kind of output you'd get.

Today, it's extremely nonlinear. One good investment decision can make a company \$10 million or \$100 million. One good product feature can be the difference between product-market fit and complete failure.

As a result, judgment and accountability matter much more. Often the best engineers aren't the hardest workers. Sometimes they don't work very hard at all, but they dependably ship that one critical product at just the right time. It's similar to the salesperson who closes the huge deal that makes the company's numbers for the quarter.

People need to be able to tell what role you had in the company's success. That doesn't mean stomping all over your team—people are extremely sensitive to others taking too much credit. You always want to be giving out credit. Smart people will know who was responsible.

Some jobs are too removed from the customer for this type of accountability. You're just a cog in a machine.

Consulting is a good example. As a consultant, your ideas are delivered through someone else within the organization. You may not have visibility to the top people; you may be hidden behind a screen. That's a trade-off you're making in exchange for your independence.

You'll develop thick-skin if you take on accountability

When you have accountability, you get a lot more credit when things go right. Of course, the downside is you get hurt a lot more when things go wrong. When you stick your neck out, you have to be willing to be blamed, sacrificed and even attacked.

If you're the kind of person who thrives in a high-accountability environment, you're going to end up thick-skinned over time. You're going to get hurt a lot. People are going to attack you if you fail.

Scale your specific knowledge with apprentices

Nivi: Once you get some specific knowledge, you can scale it by training your own apprentices and outsourcing tasks to them.

Naval: For example, I made good investments and figured out the venture business. I could have kept doing that and making money. Instead, I co-founded Spearhead to train up-and-coming founders to become angels and venture investors. We give them a checkbook to start investing.

It's an apprenticeship model. They come to us with deals they're looking at, and we help them think it through. This model is more scalable than my personal investing.

Specific knowledge comes on the job, not in a classroom

At Spearhead we lead classes teaching founders about investing, and we also hold office hours to discuss specific deals they bring.

It turns out the classes and talks we lead are largely worthless. You can give all the generic advice people need in about an hour. After that, the advice gets so circumstantial that it essentially cancels to zero. But the office hours are incredibly useful.

This reinforces the notion that investing is one of those skills that can only be learned on the job. When you find a skill like that, you're dealing with specific knowledge.

Another good indicator of specific knowledge is when someone can't give a straight answer to the question: "What do you do every day?" Or you get an answer along the lines of, "Every day is different based on what's going on."

The thing is so complicated and dependent upon circumstances that it can't be boiled down into a textbook form.

Nivi: The mafia figured out this apprenticeship model a long time ago. The best way to end up running one of the families was to become the driver for the Don.

Naval: Tony Soprano was a businessman who had to enforce his own contracts. That's a very complicated business.

This transcript has been edited for clarity.

HOW TO ANGEL INVEST, PART 1

This is a preview of our Spearhead podcast, where we discuss startups and angel investing.

Naval: Hey everybody, it's Naval and Nivi. We're going to talk about something very different than what we've discussed in the past.

Back in the day, we did Venture Hacks, which was all about the game theory of venture capital and helping entrepreneurs raise money. Later, we talked about "How to Get Rich," which was general advice on wealth creation for the average person who's starting a business. Now we're going to talk about angel investing.

Advice for new angels in technology hubs

We expect this podcast to resonate most with people who are in a technology hub and have started investing but are not yet pros. So brand-new angels, VCs and founders who are dabbling in it.

Let's say you're living in Silicon Valley—or you're in Shanghai or Beijing, or you're in Bangalore, or you're in London, or you're in New York—and you get access to a lot of interesting tech companies; you're in the tech business and earned some extra money or raised some money. How do you become a good investor?

Where to learn the basics

This podcast assumes that you have some familiarity with investing. It's not going to be a cold start. There are resources we can point you to for the cold start. Paul Graham wrote a piece called "How to be an Angel Investor." There's "How to be an Angel Investor, Part 2" on Venture Hacks. There's a course called Future Investor. You can look at all of those for the basics.

We're going to focus on more advanced topics in this conversation. We're going to talk about things like how to figure out what a fair valuation is; what are the pitfalls of bridge rounds; how pro-ratas work; how can you squeeze into a round when there are VCs leading; when a co-investor is providing a valuable signal versus when they're just talking their own book; how to size up markets and startups quickly; whether you should specialize in a single vertical or diversify into multiple verticals.

Open-sourcing what we teach at Spearhead

This podcast open-sources what we teach at Spearhead, a fund we created that trains the next generation of angel investors. It gives founders checkbooks, provides mentorship and teaches them the skill of investing, which is something that will be valuable to them for their entire lives.

This is not investment advice; it's just one unique approach to investing

Naval: Now, this is the Internet and this is America, so we have to give you some disclaimers. Angel investing is a great way to lose your money. There's an old quip, "How do you become a millionaire? Start as a billionaire and start investing." This is a good way to lose money if you don't know what you're doing, or if your timing is bad, or if you're just plain unlucky.

This is not investment advice

Naval: This is not investment advice; but you may find this useful if you're already in the profession or in the hobby of angel investing.

Nivi: Like everybody else, our advice is going to be well-meaning but we'll probably end up talking our own book in the process.

Some of what we say will be speculative, but it'll be stated as if it's a fact. Some other things we say will be just plain wrong.

Naval: Our advice may go out of date quickly because technology is changing rapidly, as is the investment ecosystem. A decade ago Y Combinator was brand new; AngelList didn't even exist; the First Round Capital platform wasn't there; Andreessen Horowitz wasn't there; you didn't have a lot of late-stage investments by hedge funds; you still had companies going public earlier. So the market was very different.

This is just one unique approach to investing

Nivi: This is one unique approach to angel investing. The things we're going to talk about might work for us from time to time, but other people might have similar or better results with completely different or opposite strategies.

Naval: We're very focused on early-stage technology startups in San Francisco and Silicon Valley. A lot of this will not translate to other locations. There are many important exceptions to everything we're going to talk about.

Nivi: We'll also be discussing startups and funds that we've personally invested in and have a financial interest in.

We change our minds constantly

Naval: We're also constantly changing our minds and learning. That's what intelligent people do. We hold contradictory and opposing thoughts in our head at the same time. We have a multitude of opinions that often contradict each other. This is not math or science or equations, and we're always changing our opinions. As Marc Andreessen says, "Strong opinions, loosely held."

It's a gold rush era in technology hubs like Silicon Valley

Naval: We're living through a unique time when, as Andreessen says, software is eating the world. We're undergoing a phase shift where technology is being adopted by everybody, not just knowledge workers.

This transition has created a gold rush era in technology. If you're in the tech industry and living in one of the tech hubs, you're already halfway to being a good investor. That's half the battle. You're well positioned to angel invest.

There are only a handful of these hubs. If you have to ask, then you probably aren't in one. It's usually obvious. There will be hundreds of startups, at least, including some with successful exits that made their investors rich.

If you're not in a tech hub, the odds are stacked against you

If you're in the tech industry but not in a tech hub, you should consider moving to one—unless there are strong lifestyle reasons keeping you away, such as family or quality of life, which is often higher outside of the technology hubs.

You can do it remotely, but the odds are stacked against you. You won't have the trust networks; you won't see enough of the dealflow. In this case, it's often better to work through a proxy, like investing in a trusted friend's venture fund or going through AngelList or coming in for YC Demo Day.

There are about two dozen tech hubs in the world

Nivi: Do you think this advice is just for people in Silicon Valley, or does this apply in New York? Does it apply in Seattle? Austin? China? Bengaluru?

Naval: I think it applies in probably two dozen cities around the world. Some of these cities are emerging, which complicates this. Seattle and Austin are probably stable; you can probably find good deals there. But you need to have access to everything and realize that the city may only produce one or two great companies each year.

Silicon Valley is a more forgiving place to invest

Silicon Valley's a little more forgiving: There are maybe 20 or 30 great companies created every year. You just need to invest in one of them—although you'll have to find them in a much larger pool of companies.

Places like Bengaluru, India, or even Kuala Lumpur, Malaysia, be may be up-and-coming cities, but timing is hard: Is this when the tech industry there breaks through? If you're in Australia and invested in Canva or Atlassian, then great. But if not, there's not as much of a pool to work with.

At the same time, your returns potentially can be a lot higher outside of tech hubs. Because there's less competition, the valuations tend to be lower because the risks are higher.

You don't want to be in a city with no history of producing good startups, where you only see one or two startups a year and you're paying Silicon Valley prices because they're keying off of valuations they saw at YC Demo Day.

It's much safer and easier to get started in San Francisco, New York, Beijing, Shanghai or Bengaluru. Pros can play in places like London, Austin, Seattle, Denver, Boulder and Chicago.

Anything below that, and you better know what you're doing. We have seen a phenomenon on AngelList: Angels invest locally in a city that is not producing good tech startups, only to surrender and start investing in Bay Area startups because they don't see the quality or returns in other cities. The returns are so much higher in Silicon Valley.

The best indicators of a startup hub are exits and later-stage investors

Nivi: What's the best indicator that a startup hub is working? Is it exits? Is it a thriving community of other angel investors?

Naval: Unfortunately, it's exits.

The typical way a hub develops is this: Founders start a company, the company does well, the founders and employees get rich in the IPO or acquisition—and then they start investing in their friends and co-workers. They feel comfortable doing this early investing because they made their money through tech startups. They want to put it back into tech startups.

But there are a lot of false starts. Angel investors will pop up in an area and invest in a bunch of companies—but then those companies get stranded because there are too few Series A or Series B VCs there to invest in them. The VCs come in, pay low valuations and wipe out early investors by converting them to common and putting warrants on top.

So funding markets, to some extent, develop in reverse compared to other markets. The least risky investments are mezzanine rounds right before the company goes public. Next are Series Ds and Series Cs. Series Bs are riskier than that, and Series A even riskier. The riskiest is angel investing, before the Series A.

So, in a weird way, angel investing is the thing that should develop last in new hubs. But that's not always the case. If a company can break out with just angel money, then later-stage money will find it no matter where it is—or the company can move to a mature hub with later-stage investors. But then, you have a big funding gap between the angel investment and the next investor, so the company has to get really far on just the angel investment.

There's no better place to invest today than technology

Naval: The returns in angel investing are interesting. There's this meme that angel investors lose all their money and venture capital is a terrible business. It's true if you aggregate VC and angel investments across the world. But if you stay focused in technology hubs, it's largely not true.

A competent angel investor in Silicon Valley who's plugged into a good network, knows what they're doing and has a broad portfolio might make somewhere between three to 10 times their money over a decade. That's quite a return. Keep in mind, though, there's a high amount of specific knowledge and labor that investors put into each of these investments.

There are tax benefits to angel investing

These gains are considered capital gains, which are usually taxed at lower rates than income. This is partially because it's a secondary tax on corporate income; it's already been taxed at the corporate level.

There are also tax breaks for angel investors ranging from the qualified small business stock exemption in the United States to very favorable tax breaks in England and other countries.

From a tax-advantaged basis, if you're willing to tolerate high risk and illiquidity, it's very hard to look at any other asset class where you can make as much of a raw return on your money as a patient, diversified, plugged-in angel investor.

The less efficient the market, the better you will do

One way to think about it is: The less efficient the market and the more wealth the underlying asset is creating, the better off you're going to do. For example, art doesn't really create that much wealth; it's more of a tax haven and speculation instrument. The same with wine: The asset itself does not generate much wealth, but the underlying market is very inefficient; so you can make money more easily.

Gambling actually destroys wealth. So it's not a great asset class to play in, unless you own the casino, in which case you have an edge over everybody else.

Few people can play at angel investing

Angel investing is odd in that very few people can play in it. Very few people have the know-how, geographic access, capital, risk horizon and patience. But at the same time, the underlying assets are changing the world.

I see a lot of people in Silicon Valley who could be good angel investors —they are in the tech industry and have access to dealflow—but instead spend their time on other things. They spend time thinking about macroeconomics: What if the Fed cuts interest rates? What's happening in the trade war with China? Or they're shorting stocks, investing in special economic zones or flipping real estate.

You should be doubling down on tech

I have a friend who's a great VC and runs a rental business on the side. I scratch my head at that. You're living inside the gold mine—people are digging up gold next to you. The returns in this industry are higher than anything else. You understand it so well. You have specific knowledge. But you have a contempt for investing more in tech that comes from your own familiarity with the industry.

If you're in the tech industry, you should be doubling down. I don't know a better industry or better place on the planet to be investing, for today.

Financiers now come to Silicon Valley to invest in companies first

Naval: The tech industry is still underestimated. People used to think of Sand Hill Road as a nice, little backwater compared to the gargantuan Wall Street. Now there's an acknowledgment that Sand Hill Road is an important place, even though Wall Street still captures the headlines.

If you're investing in the IPO, you're literally last in line

It's becoming increasingly apparent that Sand Hill Road produces the technology that generates much of the wealth in the U.S. The wealth originates here and spreads elsewhere. Wall Street financiers now come to Silicon Valley to invest in companies before they get to Wall Street.

By the time a company goes public, you can bet anybody with connections, an appetite, investing skills and capital got a bite at it. So if you're investing in a tech company's IPO, you are literally last in line. That's not to say you can't make money—but the odds are lower because the fruit has been picked over many times.

Nivi: The last bunch of financiers who were sitting in the right place at the right time—we call them Wall Street. This is where people used to get capital for their startups. Back then, there was no other market for fundraising until you had the metrics to go public.

Silicon Valley is turning into the new Wall Street, except it's not as formalized, organized and segmented. The JP Morgans and NASDAQs haven't popped up.

A 401(k) plan is like investing in the DMV

Naval: This is going to fly in the face of conventional wisdom. The average person should be saving for their retirement. But I never set out to save anything; I reinvested almost everything.

In economics, there's the savings identity, $S=I$, savings equals investment. If you contribute to a 401(k), that money is getting reinvested in "safe" but unproductive parts of society, such as the government.

You're investing in the DMV and the Defense Department. Their returns have not been spectacular. It's essentially just whatever money they can take at gunpoint from taxpayers and foreigners.

If you're in the tech industry, it's generally a better bet to invest back in the industry—especially if you're young and can get diversified.

\$50,000 invested in a smart entrepreneur will change their life

Invest in the smartest, best and brightest people around you, rather than people in far-away lands with far-away motives who already have trillions of dollars of capital flowing into them and are not as motivated as your neighbors.

Fifty thousand dollars in your IRA isn't going to make a difference to the U.S. government when it gets put into a T-bill. But \$50,000 invested in an entrepreneur down the street will change their life.

If you can find 10 to 50 investments like that, one or two of them may pay off, assuming you listen to us and build skills along the way.

I sleep well knowing my net worth is invested in the best talent

Most of my net worth is illiquid and lying in startup companies. But I sleep well at night knowing that hundreds of teams of brilliant entrepreneurs are working hard to build things that could be massive and change the world.

These teams include some of the best talent in the world: founders, coders and designers who studied at top schools. They're leveraged with venture capital, products with no marginal cost of reproduction and the most modern methods of distribution.

It just takes a few of these companies for the entire portfolio to balance out. If you invest in 100 companies and one of them produces a 1,000x return—which is not that unheard of—the other 99 investments could go to zero and you would still see an overall return of 10x.

As the hits get bigger, it makes more sense to invest and a little less sense to start companies

Naval: Like other industries, the best way to make money in technology is to own a piece of a business. "You're not going to get rich renting out your time. You must own equity—a piece of a business—to gain your financial freedom."

Founder, employee or investor?

How do you gain substantial equity in a business? One of the classic models is to start your own company. There are downsides, though. For one, it's highly stressful, grueling work. For another, your chances of success aren't great; very few companies succeed. You may have to get back up at the plate and take a few rounds at bat.

Another classic route is to get recognized as an extremely competent execution person, so you get the call when the next successful company's scaling. You want your name on the list when the founders of the next Uber or Dropbox call up their favorite investors and say, "Hey, who are your 10 best engineers that I can recruit right now?"

Someone who's done a great job at other companies can get a fairly large amount of equity to join a rocketship that's already solved product-market fit.

As the hits get bigger, it makes more sense to invest

Finally, you can get rich as an investor. As the hits become bigger and bigger and the returns become more nonlinear, it makes more sense to play as an investor and a little less sense to play as a founder.

This is because the upside is nonlinear. When you invest in a startup, you can make a 100x, 1000x, 5000x, 10,000x return—if you were in a Facebook seed round, for example. You'll own a lot more of your own company, but you may only make a 10x or 100x return.

The human brain is not wired to understand nonlinearities. The people who do—people like Paul Graham and Peter Thiel—end up becoming billionaires as investors, rather than through companies they started themselves.

Now, being a founder is a lot more fulfilling than investing. Many investors tell me they wish they were building something. Being a founder gives you a deeper sense of purpose. There is a sense of teamwork and really being involved.

On the other hand, leading companies burns you out and ages you quickly. Being a founder your entire life is a very tough road. Most people do not have the constitution for it.

Angel investing is something you can do until the day you die

Angel investing is something you can do when you're 50, 60, 70 years old. It's something you can do part-time, if you're partially retired or on leave with a new baby. It's a way to make money when you can't crank like you used to as an entrepreneur, whether you're focusing on your family, have a health issue or are simply tired.

Nivi: Your judgement and your access to capital and dealflow also go up as you get older. It takes a long time to learn, but investing is one of the few professions where you can improve until the day you die.

Naval: Warren Buffet is one of the richest, self-made people on the planet because he's been compounding capital for a long time. He started reading annual reports when he was 10, 11, 12 years old, and he's still going strong. If he started later, he would be nowhere near the top 400 list on Forbes, because the magic of compounding wouldn't have worked.

Every founder should learn angel investing

There's a famous line, "Try to learn something about everything and everything about something." In that sense, it's great to be a founder and also do some investing.

Nivi: Updating that quote for founders: Focus on your work and invest in your network.

No investor would put all their eggs in one basket—why should you? The smart money isn't trying to find the solution to product-market fit. Instead, it's betting on a lot of reasonable solutions.

You need to raise money, develop judgment over time and gain access to the right deals

Naval: The three things it takes to get into investing are capital, judgment and dealflow.

Capital is the hardest or easiest to get—depending on your circumstances

To get capital, either you make your own money to invest, or you gain enough trust from other people to invest their capital.

Sometimes you scratch your head and say, "How's this person in the venture business?" Often, they have family money or married into money; or they managed money for somebody else; or they have a billionaire friend; or they had access to a large fund and that capital got them in the business.

At Spearhead we train founders to be investors by giving them million-dollar checkbooks. Later on, we help them raise more money from limited partners. So that's another way to get capital.

Money raised from friends and family can be either the hardest or easiest money to raise, depending on your circumstances.

Apply the same high bar to investments as you do to yourself

Second is judgment. They say good judgment comes from experience, and experience comes from bad judgment. You build good judgment over time.

Judgment means applying your highest standards and taste in the things you know the best.

As a founder, you set a high bar for yourself: You only want to recruit the absolute best; you only want to do your best work; you're constantly improving; you're the worst critic of your business; every little thing that's wrong with your product bothers you.

Then you meet someone raising money, fall in love with their idea and ignore other things: the person doesn't seem that smart; or it's not someone that you'd work for or even hire; or their product is only half-baked; or they're executing slowly.

You look past all of that. You lower your judgment because you fantasize about all the things that could go right.

It's very important when you're investing in other people that you keep a high bar and use sound judgment. You need to have taste.

Good investors are more pessimistic than good founders

Some of the best investors I know are incredibly difficult people. It's hard to please them; they see the problems in everything. A good investor often is a lot more cynical and pessimistic than a good founder.

A good founder must be a rational optimist; whereas a good investor can bounce maniacally between being optimistic enough to see the future and get into the deal, and being pessimistic enough to see the potential downsides and pass on nine out of the 10 deals they see.

If you do more than one out of every 10 deals that you look at, you're probably being too optimistic. If you stumble into great deals all the time, that says more about you than it does about your dealflow.

There are exceptions, of course. You might have a unique advantage to your network: if you're sitting in the latest YC batch and see everything early; or if you run the Stanford Entrepreneurship Network and are picking from the crop getting funded by VCs, for example.

Everybody has dealflow—the challenge is getting in the good ones

The last piece is dealflow, which also includes access. This is an area we're going to focus on: How do you get dealflow? How do you get good access?

Dealfow and access are not the same thing. You can get dealflow by going on AngelList; by sitting at Y Combinator Demo Day; by going to any technology conference; even by watching "Shark Tank"—but that doesn't mean you have access to those deals. It doesn't mean that you have the ability to invest in those deals when you want, on the terms that you want.

When you get cut out of hot deals, that's a sign you're going to perform poorly as an angel investor. You need to do whatever it takes to up your access.

Most returns come from a few deals—don't let them pass on you

Nivi: There are so many sources of dealflow out there, from friends and incubators to AngelList, FundersClub and Republic. Why is it so important to get into the deals you want to get in to? What happens if you don't?

The majority of returns come from a few deals

Naval: One out of 100 or 1000 companies account for the majority of the returns every year.

If you look at just about any successful angel investor's portfolio, the majority of returns come from one deal. And when you take out the top deal, the majority of the remaining returns come from the second-largest deal. It's extremely nonlinear.

If you removed the top two or three deals out of just about any fund's portfolio, you would probably have a negative performing fund, instead of a 4x to 10x fund.

Getting cut out of deals is a sign you won't do well

It's all about adverse selection. When you get cut out of a deal, that's an indication that the deal may be a winner. Instead of a one-in-100 chance of becoming big, the chances are probably one-in-five or better.

This is a common scenario: You meet a company that's raising capital, and while you're taking time to decide, a top-branded investor rolls in and writes a big check; next thing you know, everybody piles in because there's tons of signal; and now the entrepreneur says, "Sorry, the round's closed," or, "I only have \$10,000 left for you." This is when your brand makes a difference.

I started AngelList partially because I was cut out of some very big deals early on that, to this day, I have qualms over. These would have been career-defining deals that would have made me a lot of money. But my brand simply wasn't strong enough.

Even though you want to be non-consensus right, there comes a point when consensus has value: when the Sequoias of the world show up; when the statistics become more baked; when the founders are well known; when there's more information on the table. Also, when Sequoia invests, it can create a self-fulfilling prophecy by removing some future financing risk and allowing the company to stand out when it's recruiting or going for PR.

Nivi: Dealflow and access are the most important things to work on as an investor. Your judgment doesn't have to be that great, because the returns follow a power law. And you can always get capital if you have good dealflow and access.

It's okay to pass on investments—you just don't want them to pass on you. You don't want to hear, "I will come to you if I don't get money from Sequoia."

Paying two-and-twenty to a good angel investor is a steal

Naval: This is why it's often better to back an angel investor and pay their management fee and carry, rather than going out on your own. In angel investing, it's a steal.

The old two-and-twenty model was put in place by KKR, a private equity firm managing billions of dollars. Today, an angel who's managing a just a few million dollars will charge you the same two-and-twenty, even though their labor as a proportion of the invested capital is far higher. Go to YC and ask them to invest your money for two-and-twenty at the same time they put in their own money, and they'll laugh you out of the room.

A brand is an authentic reputation you have with founders and investors

Nivi: To get into good deals, you must give startups a reason to pick you over other investors. You need a brand. Typically, this means adding value to the startup in some unique way. Let's talk about 101 different ways to build a brand.

Naval: This is the meat of it, the heart of it. We'll get into how you develop judgment and the ins and outs of raising capital. All of that is secondary.

The single most important thing is having the ability to get into a deal that you want to get in to—that's access. The way you get access is by building a brand.

A brand is an authentic reputation you have with founders and investors that tells people around the table, "Let's invite this person to invest in our round, even though it's scarce and everybody wants in now that the signals are there."

So how do you build a brand?

Investing in winners is the best way to build a brand

The classic brands in the venture business developed reputations for making great investments. Sequoia was built this way. Andreessen was partially built this way, where you pay more for deals in later rounds. You associate yourself with the company's brand, and then you use that to get into earlier, hotter deals.

It's a tautology: Invest in the winning companies, and you'll develop a brand that lets you invest in winning companies. But that's circular; it doesn't help you much.

You can build a brand through content

Another way to build a brand is to provide something new that's pro-founder. This could be a stance: Andreessen Horowitz is famous for its founder-friendly stance; they want to see the founders run the company.

It could be content. I built a brand through Twitter. Elad Gil developed his brand partly by writing the High Growth Handbook. Reid Hoffman also wrote books, though he also has many other reasons to have a good brand.

You can build a brand through blogging. When he was getting started, Paul Graham wrote amazing pieces that attracted people to YC and Hacker News. Fred Wilson still maintains the most popular blog in venture capital at AVC. Brad Feld laid out the mechanics of VC investing—allowing him to run a fund out of Boulder, which is unusual.

Back in the day, David Hornik, Andrew Anker and I started VentureBlog, one of the first venture-related blogs. We should have stuck with it.

Many investors built great brands with a very founder-friendly stance and by providing content, networks, software, platforms or access for entrepreneurs that did not exist before.

The airwaves are too crowded for undifferentiated content and distribution

Naval: As we discussed, the first way to build a brand is being a good investor to begin with. A second way is creating content that helps entrepreneurs. A third way is building infrastructure or platforms that help entrepreneurs.

Paul Graham can get into deals because of Y Combinator. Nivi and I often can get into deals because we started AngelList. Ryan Hoover can get into deals because he started Product Hunt. Platforms created by First Round Capital and Andreessen Horowitz help them win deals against other VCs.

You can also start a conference. Jason Lemkin created the SaaStr conference; Tim O'Reilly at OATV publishes content and hosts conferences.

Steven Lurie is great at recruiting, so he started Team Builder Ventures. He put his value right in his brand name. Companies know what he offers; they know why they should give him a piece of the round and how he's going to help them.

You're not going to build a brand simply because you want to

There are nuances, though. A VC will say, “We need to build a brand; therefore we need to have a blog. Let’s hire a content writer and launch a blog.” Or, “Man, I need to up my Twitter game. I’ll get on Twitter and start telling entrepreneurs about my investment criteria.”

You’re not going to build a brand simply because you want to. Rather, a brand is an authentic expression of who you are. So whatever unique insight you have, express it in the most authentic way possible.

If you’re good at Twitter, get on Twitter. If you’re good at blogging, blog. If you’re good at writing books, write books. If you’re good at speaking, speak at conferences or create a podcast.

But you’re not going to be successful by aping somebody else; it must be authentic to you.

Also, the media airwaves are now crowded, so you need top-quality content and distribution.

Even though this podcast is an amateur effort, we cut things into snippets, clean up the voices and create transcripts and highlights. We’re at the leading edge of the curve.

Sure, other people can copy us and catch up—but by then we’ll be somewhere else. We may be off writing a book, doing a road show, running an incubator or building another software platform. We stay ahead of the competition because we’re always tinkering at the edge.

You have to be willing to do something that hasn’t been done before

Naval: Whatever your brand is, it has to be clearly articulated; it has to be messaged. It has to be authentic to who you are. It should be differentiated from what everybody else is offering, and it should resonate with entrepreneurs. The worst strategy is taking a lot of coffee meetings or saying, “I’m a good, passive, hands-off person. I won’t bother you, and I’m always available to help.” It’s too generic.

You can build a brand through your advisors and limited partners

If many of the investors and advisors to your fund are computer science professors at major universities, then entrepreneurs will want you as an investor because you have access to people who can bring grad students, help with technology diligence, or solve hard algorithmic problems.

You may come from the real estate industry, and all the real estate tech startups want you because you have a deep understanding of the industry, partners and contacts in the industry, and your own properties.

You can build software for startups

Nivi: You could be the world's expert at helping a startup raise its next round. You can build software for startups like AngelList. There's still 100 different things in the world of software for startups that haven't been done.

You can be an expert at raising money from international investors, in China or Brazil. You can break into a new market by backing scientists and technologists in a new market. You can be the world's expert at scaling. You could build open-source tools for startups.

Naval: There's extremely little innovation in the venture capital business. It's quite easy to stand out. You have to be willing to do something that other people haven't done before. In other words, you have to be willing to take on accountability and risk being wrong.

You can buy common stock instead of preferred

Nivi: Do you think someone will try to build a brand around buying common stock from entrepreneurs, instead of preferred stock?

Naval: People have done that a little bit. Andreessen Horowitz started to do that; they became registered investment advisors so they can do secondaries. You could argue that's a core part of YC's brand. They buy at a low valuation in the first round, but they used to buy common; so they were completely in the same boat as you.

There's no branded firm—or angel investor writing large checks—that is buying common. I think it's a clever strategy and something that we may yet see happen. It does have the problem where the company can shut down and keep your money.

But there are clever ways around that. You could say, “I’m buying preferred stock, but after two years it converts to common stock.” When they burn through your cash and raise somebody else’s cash, you’re no longer sitting on top of them in a liquidation preference overhang. But at the same time, your money’s already been spent, so it’s not like they can shut down the company and run off with your money.

I pitched growth hacking to Twitter; they passed on it—but they let me invest

Naval: Strangely enough, my brand started out in growth hacking. I co-built a Facebook app that got 20 million installs pretty quickly, and I used that as my calling card with entrepreneurs. This was in the early days before Andrew Chen blew it open for the world.

A friend told me about Twitter. Back then, it was still text-message based and very much a toy. It was the pre-app. I tried it and liked the product. I tracked down Evan Williams to ask about investing.

Ev had just given a bunch of money back to investors for a failed podcasting venture called Odeo. He’d kept Twitter, the one thing out of that studio that looked interesting.

At that point his round was done and he had a little bit of allocation left. He more-or-less asked, “Why should I let you invest?” I got on a whiteboard for half an hour and laid out what little I knew about growth hacking, while he and his deputy watched.

At the end he said, “This sounds great. We’re not going to do any of it because it’s against our ethos.” I respected him for that. But he was impressed enough that I cared and I’d thought about it, that I got a chance to invest in Twitter. That was my first major angel investment that worked out.

Ryan Hoover and Patri Friedman have interesting brands

Nivi: Are there any new angel investors who have done a good job building a brand?

Naval: I don’t know if they necessarily built brands to invest, but I think a few developed brands through their natural activities that will give them the ability to invest. The rest of it—judgment, capital and so on—is still up to them.

Ryan Hoover has a great brand. His Twitter game is among the best I've seen; he builds community on Twitter simply as a side effect of breathing. He's going to have a good brand as an angel investor, especially with consumer companies.

Patri Friedman also has a strong brand. He's investing in startup countries and sovereign individual projects. It's a distinctive enough thesis and angle that all of the libertarians and free-state types will flock to him. He's the first to put a stake in the ground and say, "I'm going to fund these kinds of activities," which means he'll get to see all of the limited dealflow in that space.

At the same time, there are lots of other projects, especially in crypto, that will be naturally inclined to let him invest. They aren't necessarily about starting a free state but overlap in some way. The people starting those companies are sympathetic to free-state projects and are themselves sovereign individuals. These are the people who signed petitions to free Ross Ulbricht and Julian Assange—and I'm one of them, by the way.

If the market never shows up or shows up late, your brand is shot

Nivi: You don't want to build a brand around a specific market thesis, right?

Naval: You don't want to build a brand around the transition from X technology to Y technology—because when that transition is complete, so is your brand. You also don't want too narrow of a brand or a brand in a space that doesn't materialize. If you have a cleantech brand that's focused entirely on solar and solar doesn't arrive on schedule, then your entire area of expertise is shot.

Top VC firms rarely specialize

When you're starting out, there's pressure to specialize because of your expertise and network and because you may want to raise capital. But if you look at the top VC firms, they're rarely specialists; they're usually generalists. Even when they specialize, they specialize in something like "being weird." Take Founders Fund for example: They do a lot of deep-tech deals and weird deals, but they don't specialize further than that. They don't say, "We're synbio only." Or, "We're AI and machine learning only." You have to resist that urge, because very often these trends don't materialize.

Mistimed or unrealized markets cost investors a lot of money

I'm old enough to remember when cleantech was a wave that cost Kleiner Perkins a lot of money and Java was a wave that cost investors a lot of money—because cleantech took longer than expected and Java never turned out to be a massive market.

With cleantech you could argue that getting into Tesla or SpaceX forgave everything. But it also means that you missed everything if you didn't get in those deals; if you weren't in the Elon Musk mafia.

You don't want to be too narrow. At the same time, it's hard to stand out if you're too broad. Then you're back to, "I'm a good person who does coffee. Let me invest."

It's best to build a brand around your unique capabilities, platforms and assets, but not around verticals.

Branch out from your network after you've built your reputation

Naval: The best deals tend to come from your network—people you've trusted for a long time, especially early on.

It's notoriously difficult to invest in one of Elon Musk's companies. Even in high-priced rounds, it's nearly impossible to get into a SpaceX or a Neuralink. All the people Elon has made money with in the past swoop in, get first rights and take up the full allocation.

If you're getting invited to one of Elon's rounds and you've never met him or made money with him, you almost have to wonder if he's run out of friends.

The urge to hunt for deals actually will lower your returns. Some of the best angel investors make early wins by investing in people in their close network, in spaces they know well.

Branch out after you've exhausted your network

It only makes sense to branch out when your network is exhausted. But now you also have a reputation and more capital—because you made some money and have been successfully investing in your network. Now you have reputation, capital and know-how.

Without those, it's dangerous to start investing in spaces you don't know, people you don't know, and, most dangerously, deals you're invited to by strangers. Because you can bet that if they're inviting a stranger, they've already exhausted their network of close allies and comrades.

Create your own dealflow by helping companies get started

Nivi: Do you think there's an opportunity to build a brand investing at the pre-seed stage before—or simultaneous with—accelerators?

Naval: Accelerators give advice on how to start a company at scale. They don't give you that much money, but they give you important know-how: how to put your company together, recruit and rev your idea; when it's ready for investors; how to approach the first customers and measure customer growth; how to get your MVP out there.

Accelerators are training wheels until you're ready to go raise money. An angel investor can do this—they just have to put in the time. And, actually, it's the best place to play because the valuations at the seed stage are where Series A rounds used to be.

Be a shadow co-founder to create your own dealflow

The best way to get good valuations and dealflow is to create it yourself: Ally yourself with entrepreneurs and become their shadow business co-founder.

When technical entrepreneurs start out, they often give up half or two-thirds of their company to a seller, who helps put the company together and raises the money.

You can help founders put their companies together. You can put in the first bit of money. In return, you can might be able to get common equity or, at least, favorable investment terms. Later, you can help recruit a seller for 5% or 10% of the company, as opposed to 50%.

Nivi: If you're investing at the pre-seed stage, you can back great teams, set the terms that you want and negotiate pro-rata rights.

Get valuable pro-rata rights by investing pre-seed

Naval: Pro-rata rights are the ability to invest in later rounds.

Let's say you own 5% of a company through your original investment. Your pro-rata right gives you the right to provide 5% of the new capital in future rounds.

Even though you may already own a lot and may not care about the dilution, the cash-on-cash returns for later investments tend to be much better. You might be able to put \$30 million in the pro rata, instead of your initial \$3,000.

Once the company's more proven, limited partners and big funds will fight for pro-rata rounds. They will pay you carry and management fees to invest in that pro rata. And you're not waiting 10 years for liquidity on that investment. In later rounds, the company might be just two years away from liquidity.

So pro ratas can be quite valuable. They also keep you plugged into the company. You keep a closer relationship with the management team; they have to let you know what's going on. And if there's a down round or a washout round, your senior stock may protect some of your holdings.

Work from first principles and make up your own mind

Naval: Most of what we say on this podcast is consensus knowledge, or wisdom. Experienced VCs will say, "Duh. Of course, that's obvious." But it's not designed for them.

Be non-consensus right

At the same time, the real money in this business is made by being non-consensus and right: being correct when everybody else disbelieves. This happens all the time. For every deal that Sequoia does, it's possible that Benchmark, Andreessen or somebody else passed on it. For every deal that Andreessen does, maybe Sequoia didn't want to pay as much, so they passed on it.

There's a large universe of investment-grade deals that even the top VCs and angels don't agree on. Many of these go on to be successful. And then there are the consensus deals that all the top VCs agree on and try to pile into—and sometimes those end up being flameouts.

Don't learn how to invest from the commentariat

Don't learn angel investing from journalists and the average commentator on Facebook, Hacker News or Twitter. These people may be well meaning, but they don't know what they're talking about.

Everyone piles onto Theranos as an example of Silicon Valley excess. The reality is Theranos wasn't backed by any good Valley investors; it raised from out-of-market investors for good reasons. The media built up its founder to be the next Steve Jobs because they were looking for a heroine. The media built her up, and the media took her down. To any sophisticated investor, that deal smelled bad from a mile away.

The media's been hating on Mark Zuckerberg and Facebook since the start. And yet, here it is, a company worth several hundred billion dollars and everyone surrounding it is fabulously wealthy. What Facebook does for society is a different conversation, but the fact that it's a successful business is undeniable. That journalists have called for its death all along is also hard to deny.

The larger the herd, the lower the returns

To be successful in this business, you have to make up your own mind. You have to work as much as possible from first principles. You have to ignore the herd. The larger the herd you listen to, the worse your returns will be. If you go with the consensus and average thinking, you will get average returns—and average returns right now are 1% in treasury bills.

Investing keeps you sharp—and plugged into what the best founders are doing

Naval: One great reason to angel invest is that it keeps you sharp. It's an incredible way to get educated and stay up to speed in technology. Great founders will seek you out and spend an hour telling you what they spent the last year learning.

Investing also exposes you to the different ways you can start a company. You're doing a C Corp, but somebody else is doing an LLC. You raised money from angels, but somebody else went straight to VCs. You did the two-founder model, but others did five founders and someone else did the one-founder model.

Founders want to be backed by other founders

A lot of the best founders end up dabbling in other people's companies as advisors or investors because they want to be good at everything. They're building the foundation for a skyscraper, and they're going to be very careful laying down those initial beams and bricks. The best way to figure that out is to talk to other smart people with skin in the game.

The best founders also want to be backed by other founders. They want to know the people they're taking money from have first-hand experience. Especially on the angel side, being a founder often will help you get into a deal; whereas a pure financial investor may not.

Founders have unique networks and deep expertise. They may also have a unique advantage with dealflow from an incubator they went through; by being branded as a successful founder; being a domain expert; or having advised successful companies.

Investing aligns interests

Investing also is a way to give back. Many founders have a story about how someone took a chance on them early on, or about their first big break. Now you get to give other people their big break. You get to create the change you want to see in the world by supporting it financially.

Investing also helps align you with others. If you're the kind of person who's often driven by envy—which, let's face it, many of us suffer from—one great thing to do is to align your interests. Now, all of a sudden, you're backing somebody and you want to see them win.

Advisors have adverse selection

Another good reason to invest is to teach—what better way to learn than by teaching? You can also do it as an advisor. But as an advisor, you tend to own a lot less.

There's adverse selection to being an advisor: Very often the best entrepreneurs don't need or take advice. Sometimes it can work out, because of strong relationships and expertise. But just stamping your name onto a company that barely knows you is not going to make you much, and it's not going to do much for them either. Investment is often a cleaner way to do it.

EXTERNALITIES: CALCULATING THE HIDDEN COSTS OF PRODUCTS

Nivi: What's a mispriced externality? You mentioned it on a previous episode.

Naval: An externality is where there's an additional cost imposed by whatever product is being produced or consumed, that's not accounted for in the price of the product. This can happen for many reasons. Sometimes you can fix it by putting the cost back into the price.

Some of the most ardent critics of capitalism argue it's destroying the environment. If you throw away capitalism because it's destroying the environment, then guess what—we're all headed back to pre-industrial times. That's not going to be a good thing.

Pricing externalities properly is more effective than feel-good measures

Because the environment is finite and precious, we have to price it properly and fold that back into the cost of products and services.

If people are wasting water, releasing hydrocarbons into the atmosphere or polluting in other ways, society should charge them what it costs to clean up the pollution and return the environment to a pristine state. Perhaps that price has to be very, very, very high.

If you raise the price high enough, you'll knock out pollution. That's much better than feel-good measures like banning plastic bags or restricting showers during a drought.

Properly pricing externalities can save resources in a tremendous way

California likes to run declarations and ads to scare people into avoiding showers during droughts. It would be better to raise the price of fresh water. The average consumer might pay a few pennies more for a shower; but the almond farmers—who consume a lot of water—will cut back and almond farming may move to a part of the country where water is more abundant.

Properly pricing externalities can save resources in a tremendous way. It's a good framework to use when you want to do things like save the environment, rather than doing feel-good things that won't actually amount to anything.

NET PRESENT VALUE: WHAT FUTURE INCOME IS WORTH TODAY

Nivi: Let's talk about net present value (NPV).

Naval: Net present value is when you say, "That stream of payments I'm going to get in the future—what's it worth today?"

Here's a common example: You're joining a startup and getting stock options, and the founder says, "This company is going to be worth \$1 billion, and I'm giving you 0.1% of the company; therefore, you're getting \$1 million worth of stock."

Figure out what future income is worth today by applying a discount rate

The founder is negotiating based on what it's going to be worth in the future. You have to figure out what it's worth today by applying a discount rate, or an interest rate, that accounts for the massive risk startups face.

You'll end up with the amount the company is actually worth today. That's the price at which a venture capitalist would invest in the company.

If the founder recently raised a round at a \$10 million valuation, then the company's only worth 1% of what the founder says it will be worth. So your \$1 million package is actually worth \$10,000. You should get very comfortable doing rough net present value calculations in your head.

CONSUMER SURPLUS: GETTING MORE THAN YOU PAID FOR

Naval: Consumer surplus and producer surplus are important concepts. Consumer surplus is the excess value you get from something when you pay less than you were willing to pay.

I get a lot of joy out of my morning Starbucks coffee. Obviously I've made some money. So if my coffee cost \$20, I would pay it.

But Starbucks doesn't know that. They can't price the coffee at \$20 just for me, because they're selling the exact same product to others. So I'm getting a lot of consumer surplus out of the coffee.

Consumer surplus is the extra value you get when you pay less than you were willing

All businesses generate consumer surplus. It's a good thing to keep in mind when someone's harping on about how evil companies are. Amazon might be a trillion-dollar company, but I'll bet they're generating trillions of dollars in consumer surplus through people's willingness to pay for convenience. A lot of people are willing to pay more than what Amazon charges.

PRICE DISCRIMINATION: CHARGE SOME PEOPLE MORE

Nivi: Are there any other microeconomic concepts, outside of zero marginal cost of replication and scale economies, that are important to understand?

Naval: Price discrimination is important. It means you can charge people based on their propensity to pay.

Now, you can't charge people different amounts just because you don't like them. You have to offer them something extra. But it has to be something rich people care about.

Business-class seats routinely cost five or 10 times more than economy seats. But it costs the airline much less—maybe two or three times more than a standard seat—to provide perks like wider seats, more legroom and free drinks.

Rich people and large enterprises are willing to pay more

Price discrimination works because rich people are willing to pay more. You just have to give them the extra little things they need to signal they're rich or that little bit of comfort they want.

A lot of enterprise software companies use price discrimination, especially with freemium products. The free or low-price version will do almost everything you want. But if you want the version that's extra secure or hosted on your site or has multiple-user administration so the IT person can monitor everything, you'll find yourself paying 10 or 100 times more.

COMPOUNDING RELATIONSHIPS MAKE LIFE EASIER

Nivi: Earlier, we talked about compound interest, but we didn't dig into it much.

Naval: Relationships offer a good example of compound interest. Once you've been in a good relationship with somebody for a while—whether it's business or romantic—life gets a lot easier because you know that person's got your back. You don't have to keep questioning.

If I'm doing a deal with someone I've worked with for 20 years and there is mutual trust, we don't have to read the legal contracts. Maybe we don't even need to create legal contracts; maybe we can do it with a handshake. That kind of trust makes it very easy to do business.

Mutual trust makes it easy to do business

If Nivi and I start another company and things aren't working out, I know we're both going to be extremely reasonable about deciding what to do—how to exit or shut it down. Or if we're scaling it, how to bring in new people. We have mutual trust, and that allows us to start businesses more easily and compounds the effect.

The most under-recognized reason startups fail is because the founders fall apart.

A startup is so difficult to pull off, so removing potential friction points between founders can be the difference between success and failure.

It's better to have a few compounding relationships than many shallow ones

Nivi: There are a couple of non-intuitive things about compounding. The first is that most of the benefits come at the end, so you may not see huge benefits up front.

Sam Altman wrote, "I always want it to be a project that, if successful, will make the rest of my career look like a footnote." Again, most of the benefits of compounding come at the end.

Another thing that's non-intuitive about compounding: It's better to have a few deep compounding relationships than many shallow, non-compounding relationships.

It takes just as much effort to create a small business as a large one

Naval: One thing about business that people don't realize: it takes just as much effort to create a small business as it does to create a large one.

Whether you're Elon Musk or the guy running three Italian restaurants in town, you're working 80 hours a week; you're sweating bullets; you're hiring and firing people; you're trying to balance the books; it's highly stressful; and it takes years and years of your life.

In one case, you get companies worth \$50-\$100 billion and everyone's adulation. In the other, you might make a little bit of money and you've got some nice restaurants. So think big.

TURN SHORT-TERM GAMES INTO LONG-TERM GAMES

Nivi: Do you want to talk about Pareto optimal?

Naval: Pareto optimal is another concept from game theory, along with Pareto superior.

Pareto superior means something is better in some ways while being equal or better in other ways. It's not worse in any way. This is an important concept when you're negotiating. If you can make a solution Pareto superior to where it was before, you will always do that.

Pareto optimal solutions require a trade-off to improve any criterion

Pareto optimal is when the solution is the best it can possibly be and you can't change it without making it worse in at least one dimension. There is a hard trade-off from this point forward.

These are important concepts to understand when you're involved in a big negotiation.

Negotiations are won by whoever cares less

I generally say, though: "Negotiations are won by whoever cares less." Negotiation is about not wanting it too badly. If you want something too badly, the other person can extract more value from you.

If someone is taking advantage of you in a negotiation, your best option is to turn it from a short-term game into a long-term game. Try to make it a repeat game. Try to bring reputation into the negotiation. Try to include other people who may want to play games with this person in the future.

An example of a high-cost, low-information single-move game is having your house renovated.

Contractors are notorious for overbooking, ripping people off, and being unaccountable. I'm sure contractors have their own side to it: "The homeowner has unreasonable demands." "We found problems." "The homeowner doesn't want to pay for it." "They don't understand; they're low-information buyers."

It's an expensive transaction. Historically it's been very hard to find good contractors; and the contractor has little information on the homeowner.

Convert single-move games to multi-move games

So you try to go through friends. You try to find people with good reputations. You're converting an expensive single-move game with a high probability of cheating on both sides into a multi-move game.

One way to do that is to say: "Actually, I need two different projects done. The first project we'll do together, and based on that I'll decide if we do the second project."

Another way is to say: "I'm going to do this project with you, and I have three friends who want projects done who are waiting to see the outcome of this project."

Another way is to write a Yelp or Thumbtack review—especially if the contractor operates within a community and wants to protect their reputation in that community.

These are all ways to turn a single-move game into a longer term game and get past a position of poor negotiating leverage and poor information.

SCHELLING POINT: COOPERATING WITHOUT COMMUNICATING

Nivi: Let's talk about Schelling points.

Naval: The Schelling point is a game theory concept made famous by Thomas Schelling in his book, *The Strategy of Conflict*, which I recommend.

It's about multiplayer games where people respond based on what they think the other person's response will be. He came up with a mathematical formalization to answer: How do you get people who cannot communicate with each other to coordinate?

Use social norms to cooperate when you can't communicate

Suppose I want to meet with you, but I don't tell you where or when to meet. You also want to meet with me, but we can't communicate. That sounds like an impossible problem to solve—we can't do it. But not quite.

You can use social norms to converge on a Schelling point. I know you're rational and educated. And you know I'm rational and educated. We're both going to start thinking.

When will we meet? If we have to pick an arbitrary date, we'll probably pick New Year's Eve. What time will we meet? Midnight or 12:01 a.m. Where will we meet? If we're Americans, the big meeting spot is probably New York City, the most important city. Where in New York City will we meet? Probably under the clock at Grand Central Station. Maybe you end up at the Empire State Building, but not likely.

You can find Schelling points in business, art and politics

There are many games—whether it's business or art or politics—where you can find a Schelling point. So you can cooperate with the other person, even when you can't communicate.

Here's a simple example: Suppose two companies are competing heavily and hold an oligopoly. Let's say the price fluctuates between \$8 and \$12 for whatever the service is. Don't be surprised if they converge on \$10 without ever talking to each other.

KELLY CRITERION: AVOID RUIN

Nivi: Let's chat about the Kelly criterion.

Naval: The Kelly criterion is a popularized mathematical formulation of a simple concept. The simple concept is: Don't risk everything. Stay out of jail. Don't bet everything on one big gamble. Be careful how much you bet each time, so you don't lose the whole kitty.

If you're a gambler, the Kelly criterion mathematically formulates how much you should wager per hand, even if you have an edge—because even when you have an edge, you can still lose. Let's say you have 51-to-49 edge. Every gambler knows not to bet the whole kitty on that 51-to-49 edge—because you could lose everything and won't get to come back to the average.

Nassim Taleb famously talks about ergodicity, which is a fancy word for a simple concept: What is true for 100 people on average isn't the same as one person averaging that same thing 100 times.

Ruining your reputation is the same as getting wiped to zero

The easiest way to see that is with Russian roulette. Say six people play Russian roulette one time each, and each winner gets \$1 billion. One person ends up dead and five people get \$1 billion. Compare that to one person playing Russian roulette six times with the same gun. They are never going to end up a billionaire—they will be dead and worth zero. So risk-taking—especially when the averages that are calculated across large populations—is not always rational.

The Kelly criterion helps you avoid ruin. The number one way people get ruined in modern business is not by betting too much; it's by cutting corners and doing unethical or downright illegal things. Ending up in an orange jumpsuit in prison or ruining your reputation is the same as getting wiped to zero—so never do those things.

PRINCIPAL-AGENT PROBLEM: ACT LIKE AN OWNER

Nivi: We spoke earlier about picking a business model that has leverage from scale economies, network effects and zero marginal cost of replication. There were a few other ideas on the cutting-room floor that I want to go through with you. The first one is the principal-agent problem.

Naval: So mental models are all the rage. Everyone's trying to become smarter by adopting mental models. I think mental models are interesting, but I don't think explicitly in terms of mental-model checklists. I know Charlie Munger does, but that's just not how I think.

A principal is an owner; an agent is an employee

Instead, I tend to focus on the few lessons I've learned over and over in life that I think are incredibly important and seem to apply almost universally. One that keeps coming up from microeconomics — because as we've established, macroeconomics is not really worth spending time on — is what's called the principal-agent problem.

In this case it's a principal, who is a person; rather than a principle that you would follow. A principal is an owner. An agent works for the owner, so you can think of an agent as an employee. The difference between a founder and an employee is the difference between a principal and an agent.

I can summarize the principal-agent problem with a famous quote attributed to Napoleon or Julius Caesar: "If you want it done, Go. If not, Send."

Which is to say: If you want to do something right, do it yourself; because other people just don't care enough.

A principal's incentives are different than an agent's incentives

Now, the principal-agent problem pops up everywhere. In microeconomics, they try to characterize it this way: The principal's incentives are different than the agent's incentives, so the owner of the business wants what is best for the business and will make the most money. The agent generally wants whatever will look good to the principal, or might make them the most friends in the neighborhood or in the business, or might make them personally the most money.

You see this a lot with hired-gun CEOs running public companies, where the ownership of the public company is distributed so widely that there's no principal remaining. Nobody owns more than 1% of the company. The CEO takes charge, stuffs the board with their buddies and then starts issuing themselves low-priced stock options, or doing a lot of stock buybacks because their compensation is based directly tied to the stock price.

If you can work on incentives, don't work on anything else

Agents have a way of hacking systems. This is what makes incentive design so difficult. As Charlie Munger says, "Never, ever, think about something else when you should be thinking about the power of incentives."

Almost all human behavior can be explained by incentives. The study of signaling is seeing what people do despite what they say. People are much more honest with their actions than they are with their words. You have to get the incentives right to get people to behave correctly. It's a very difficult problem because people aren't coin-operated. The good ones are not just looking for money—they're also looking for status and meaning in what they do.

As a business owner you are always going to be dealing with the principal-agent problem. You're always going to be trying to figure out: How do I make this person think like me? How do I incent them? How do I give them founder mentality?

Only founders can fully appreciate the importance of founder mentality and just how difficult and gnarly the principal-agent problem is.

When you do deals, it's better to have the same incentives

If you are a principal, you want to spend a lot of your time thinking about this problem. You want to be generous with your top lieutenants—in terms of ownership and incentives—even if they don't necessarily realize it; because over time they will and you want them to be aligned with you.

When you do business deals, it's better to have an aligned partnership where you both have the same incentives than a partnership where you have the advantage in the deal. Because eventually the other person will figure it out and the partnership will fall apart. Either way, it's not going to be one of those things that you can invest in and enjoy the benefits of compound interest over decades.

If you're an employee, your most important job is to think like a principal

Finally, if you're in a role where you're an agent—you're an employee—then your most important job is to think like a principal. The more you can think like a principal, the better off you're going to be long-term. Train yourself how to think like a principal, and eventually you will become a principal. If you align yourself with a good principal, they will promote you or empower you or give you accountability or leverage that may be way out of proportion to your relatively menial role.

I'm always impressed by founders who promote young people through the ranks and allow them to skip multiple levels despite their lack of experience. Invariably it happens because this agent—who's way deep down in the organization—thinks like a principal.

If you can hack your way through the principal-agent problem, you'll probably solve half of what it takes to run a company.

Nivi: The reason I asked about this one first is because I feel like I never see the principal-agent problem in my work. I tend to work in small teams where everybody is highly economically aligned, and the people have been filtered for a commitment to the mission, and everybody else who doesn't work out moves on to another role elsewhere.

Naval: These are all heuristics that you have designed to avoid having to deal with the single biggest problem in management.

Deal with small firms to avoid the principal-agent problem

Another example of a heuristic that helps you route around the principal-agent problem is to deal with the smallest firms possible. For example, when I hire a lawyer or a banker or even an accountant to work on my deals, I've become very cognizant about the size of the firm. Bigger firms—all other things being equal—are generally worse than small ones.

Yes, the big firm has more experience. Yes, they have more people. Yes, they have a bigger brand. But you'll find the principal and the agent are highly separated. Very often the principal will sell you and convince you to work with the firm, but then all the work will be done by an agent who simply doesn't care as much. You end up getting substandard service.

I prefer to work with boutiques. My ideal law firm is a law firm of one. My ideal banker is a solo banker. Now, you're making other sacrifices and trade-offs in terms of that person's resources—and you are betting big on that person. But you've got one throat to choke. There's no one else to point fingers at; there's nowhere to run. The accountability is extremely high.

If you are an agent, the best way to operate is to ask, "What would the founder do?" If you think like the owner and you act like the owner, it's only a matter of time until you become the owner.

ENVY CAN BE USEFUL, OR IT CAN EAT YOU ALIVE

Nivi: Do you want to tell us about jobs you had growing up and the one that kicked off your fanatical obsession with creating wealth?

Naval: This gets a little personal, and I don't want to humble-brag. There was a thread going around Twitter—Name Five Jobs You've Held—and every rich person on there was signaling how they've held normal jobs. I don't want to play that game.

I've had menial jobs. There are people who had it worse than me and people who had it better than me.

Suffering through the wrong thing can motivate you to find the right thing

At one point in college I was washing dishes in the school cafeteria and said, "F this. I hate this. I can't do this anymore." I sweet-talked my way into a teaching assistant job for a computer science professor, even though I was completely unqualified. The job forced me to learn computer algorithms, so I could TA the rest of the course.

So my desire to learn computer algorithms came out of the suffering I experienced washing dishes—not that there's anything wrong with washing dishes; it just wasn't for me.

I had an active mind. I wanted to make money and earn a living through mental activities, not through physical activities. Sometimes it takes suffering through the wrong thing to motivate you to find the right thing.

Being a lawyer was not what I was meant to do

Back in the day I had a prestigious internship at a big New York City law firm. I basically got fired for surfing Usenet.

This was before the Internet was a big thing. Usenet hosted newsgroups, and it was the only the only thing keeping me from being completely bored. I was an overpaid intern wearing a suit and tie. I got to hang out in the conference room and make photocopies when lawyers needed them.

I was bored out of my skull. This was pre-iPhone (thank God for Steve Jobs for saving us all from unending boredom). I used to read The Wall Street Journal or anything I could get my hands on. I would've read the back of a brochure to keep from going insane, because listening to a bunch of corporate lawyers discuss how to optimize details of a contract is really dull.

They wanted me to sit there quietly and not read the paper. They got mad and said, "That's rude. That's misbehavior."

I got called up and reprimanded a bunch of times. I was finally terminated—sent home in shame from my prestigious internship, destroying my chance to go to law school.

I was unhappy... for all of an hour. Ultimately, it's one of the best things that ever happened to me. Otherwise, I would have ended up a lawyer. Not that I have anything against lawyers; it's just not what I was meant to do.

Envy can be a powerful booster, if it doesn't eat you alive

Nivi: You mentioned a catering job that kicked off your obsession with wealth.

Naval: That was an envy thing. When I was in high school, I needed a job to pay for my first semester of college.

It was the summer of 1990 or 1991. This was the Bush Senior recession—if anyone listening was alive back then to remember it—so it was actually really hard to get a job.

I ended up working for a catering company serving Indian food. One day, I had to serve at a birthday party for a kid in my school. So I was out there serving food and drinks to all of my classmates. That was incredibly embarrassing. I wanted to hide away and die right there.

But you know what? It's all part of the plan. It's all part of the motivation. If that didn't happen, I probably wouldn't be as motivated or as successful. It's all fine. It was definitely a strong motivator.

In that sense, envy can be useful. Envy also can eat you alive if you let it follow you around your entire life. But there are points in your life when it can be a powerful booster rocket.

BEING ETHICAL IS LONG-TERM GREEDY

Nivi: In the “How to Get Rich” tweetstorm you listed things you suggest people study, like programming, sales, reading, writing and arithmetic. One of the items that ended up on the cutting-room floor was ethics, which you also suggest people study.

Naval: I was going to put that out as a concession to people who believe making money is evil and that the only way to make it is to be evil. But then I realized ethics is not necessarily something you study. It's something you think about—and something you do.

Ethics isn't something you study; it's something you do

Everyone has a personal moral code. Where we get our moral code differs for everybody. It's not like I can point you to a textbook. I can point you to some Roman or Greek text, but that's not suddenly going to make you ethical.

There's the Golden Rule: "Do unto others as you would have them do unto you." Or there's Nassim Taleb's Silver Rule, which is, "Don't do unto others what you don't want them doing unto you."

Trust leads to compounding relationships

Once you've been in business long enough, you will realize how much of it is about trust. It's about trust because you want to compound interest. You want to work with trustworthy people for long periods of time without having to reevaluate every discussion or constantly look over your shoulder.

Over time you will gravitate to working with certain kinds of people. Similarly, those people will gravitate to working with other ethical people.

Being ethical attracts other long-term players

Acting ethically turns out to be a selfish imperative. You want to be ethical because it attracts other long-term players in the network. They want to do business with ethical people.

If you build a reputation for being ethical, people eventually will pay you just to do deals through you. Your involvement will validate deals and ensure they get done; because you wouldn't be involved with low-quality stuff.

In the long run, being ethical pays off—but it's the very long run. In the short run, being unethical pays off, which is why so many people go for it. It's short-term greedy.

Being ethical is long-term greedy

You can be ethical simply because you're long-term greedy. I can even outline a framework for different parts of ethics just based on the idea of long-term selfishness.

For example, you want to be honest because it leaves you with a clear mind. You don't want two threads running in your head, one with the lies you tell —and now have to keep track of—and the other with the

truth. If you are honest, you only have to think about one thing at a time, which frees up mental energy and makes you a clearer thinker.

Also, by being honest you're rejecting people who only want to hear pretty lies. You force those people out of your network. Sometimes it's painful, especially with friends and family; but over the long term you create room for the people who like you exactly the way that you are. That is a selfish reason to be honest.

If you cut fair deals, you will get paid in the long run

Negotiations offer another good example. If you're the kind of person who always tries to get the best deal for yourself, you will win a lot of early deals and it will feel very good.

On the other hand, a few people will recognize that you're always scrabbling and not acting fairly, and they will tend to avoid you. Over time those are the people who end up being the dealmakers in the network. People go to them for a fair shake or to figure out what's fair.

If you cut people fair deals, you won't get paid in the short term. But over the long term, everybody will want to deal with you. You end up being a market hub. You have more information. You have trust. You have a reputation. And people end up doing deals through you in the long run.

A lot of wisdom involves realizing long-term consequences of your actions. The longer your time horizon, the wiser you're going to seem to everybody around you.

WE SHOULD ALL BE WORKING FOR OURSELVES

Nivi: Who is this advice targeted to? Is it for my Lyft driver? Is it for an Internet entrepreneur? Is it for somebody who wants to start a YouTube channel?

Naval: Because it comes from someone who's steeped in Silicon Valley and tech companies, it's always going to have a bias towards that.

But I think it's good for anybody who wants to be entrepreneurial. Anybody who wants to control their own life. Anybody who wants to deterministically and reliably improve their ability to create wealth over time, is patient, and is looking at the long haul.

If you're 80 years old, retired and running out of energy, it's probably best to stay retired. But there are 80-year-olds who have a lot of energy, who want to do new things and live for the future.

Obviously this can apply very easily to a young person. I would say 9 or 10 years old and up.

Midlife can be the most fruitful time to apply this advice

The most difficult one is probably midlife. When we're in our 30s, 40s and 50s, we already have a lot invested. We have a lot of obligations. Those are the years we're earning; people are relying on us. We don't want to change because we don't want to admit defeat.

But that's when it actually can be the most fruitful. It may be the most difficult pivot: You have a 9-to-5 job; you have a family relying on you.

It may seem like the things in this podcast are far too idealistic, but maybe it can inform your weekend projects. Maybe it can inform your approach to education; for example, if you're taking an online course at night. Maybe it can inform what roles you take on at your current company, because they move you closer and closer to points of leverage, points of judgment or points where you're naturally talented, and you're able to be more authentic. It might cause you to take on more accountability.

Even if applied piecemeal, these principles can guide you—regardless of what stage of life you are in, short of retirement. If you're retired, test them to see if they're true and then teach them to your kids or grandkids.

There are many different ways to participate. It should apply to almost everybody who has a complete body, sound mind, and is looking to work.

Look up the value chain to find leverage

Nivi: One way to apply this advice is to look at who is getting leverage off of the work that you're doing. Look up the value chain—at who's above you and who's above them—and see how they are taking advantage of the time and work you're doing and how they're applying leverage.

People naturally do this because they want to move up the corporate ladder; but that's mostly about managing other people. You want to manage more capital, products, media and community.

People think about moving up the ladder in their organization. But they don't often think about moving to a different organization or creating their own company to get more leverage.

You will do better in a small organization

Naval: In general, *ceteris paribus*—fancy Latin words for “all else being equal”—you'll do better in a smaller organization than a larger one.

You will have more accountability, and your work will be more visible. You're more likely to be able to try different things, which can help you discover the thing you are uniquely good at. People will be more likely to give you leverage through battlefield promotions. You'll have more flexibility. There will be more authenticity in how the company operates.

Here is a good progression for a career: Start in a large company and progressively move to smaller and smaller ones. It's very hard to go from a small company to a larger company. Larger companies tend to be more about politics than merit; they're more stable but less innovative.

The goal is that we are all working for ourselves

The long-term goal is that we are all wealthy and working for ourselves. The people working for us are essentially robots. Today that's software robots executing code in data centers. Tomorrow it could be delivery bots, flying bots and mechanical bots—and drones—that are carrying things around.

This goes back to the idea that the best relationships are peer relationships. If there's someone above you, that's someone to learn from. If you're not learning from them and improving, nobody should be above you.

If there's somebody below you, it's because you're teaching them and enabling them. If you're not doing that, then get a robot; you don't need a human below you.

This is utopian and still a long way off, but in the not-too-distant future anybody who wants to work for themselves will be able to do it.

You may have to make sacrifices and take on more risk. You may have to take on more accountability and live with less steady income. But more and more I think younger people are realizing that if they're going to work, they're going to work for themselves.

ACCOUNTABILITY MEANS LETTING PEOPLE CRITICIZE YOU

Nivi: We finished discussing the tweetstorm. We're going to spend some time on Q&A and discussing tweets that didn't make it into the "How to Get Rich" tweetstorm. My first question: What are some common failures or things people typically do wrong when they try to apply this advice?

Naval: A lot of people don't understand what specific knowledge is or how to "obtain" it. People don't understand what accountability entails. They think accountability means being successfully accountable. No—it means you have to stick your neck out and fail publicly. You have to be willing to let people criticize you.

One of the reasons I'm less active on Twitter lately is because every tweet summons an army of nitpickers and haters. It gets exhausting. You have to learn to ignore them, or you won't survive on Twitter.

A lot of people try to reconcile this by asking, "Should I quit my 9-to-5 job or not?" That can be a hard decision. You don't need to go to that extreme. You can start applying accountability, leverage and specific knowledge within your existing career. You don't necessarily need to fork off and do something else completely different.

The most interesting parts should be the ones you disagree with

People will use my advice as a way to agree and disagree with their existing biases. They'll say, "I agree with that part," and, "That part you're completely wrong." The most interesting tweets should be the ones you disagree with—because clearly I've proven I know a few things. If you disagree with it, maybe that's an area where you can improve your thinking. I improve my thinking all the time.

In this tweetstorm I put down the minimum-viable principles. I shared only a small slice of what I've learned about how to make money; because 90% of it is suspect.

I put down the bedrock, the stuff I'm sure about. I have not yet seen a tweet successfully contradicting anything in this tweetstorm that would cause me to say, "I got that one wrong."

Get the free leverage that's available in tech

Some people will say, "This only applies to tech entrepreneurs." I disagree. The real estate example was a good one in that regard.

Technology drives leverage—so I'm going to push you in a tech direction to get that free leverage. Obviously, this message is being delivered through the Internet, so it's going to have a pro-Internet bias.

Don't refuse to do things just because others can't do them

Some people believe it's unfair to do anything with the opportunities they have because others don't have the same opportunities. With a defeatist attitude like that, why even get out of bed in the morning? Ninety percent of people are dead.

Many people live on a dollar or less a day. Do you? No. You play the hand you're dealt to the best of your ability. Then you can take the winnings—the pot from that hand—and do whatever you want with it to fix the world.

But if you refuse to do things just because others can't do them, you are living in denial. It's an excuse to do nothing.

Realize your philanthropic vision by running a business

Others believe wealth creation is fundamentally at odds with an environmentally healthy planet. They view it as a giant zero-sum game. That's a false narrative, too. Elon Musk is not playing a zero-sum game with the environment; there are plenty of entrepreneurs like him.

There is a word environmentalists love: sustainability. If nothing else, for-profit businesses are financially sustainable. You can do a B Corporation, which has a dual mission.

Many non-profit efforts would be better off as for-profit companies. They wouldn't have to beg for grants. They would be financially sustainable. Some great founders realize their philanthropic visions by running a business.

PRODUCTIZE YOURSELF

Nivi: You summarized this entire tweetstorm with two words: "Productize yourself."

Naval: Productize has specific knowledge and leverage. Yourself has uniqueness and accountability. Yourself also has specific knowledge. So you can combine all of these pieces into these two words.

If you're looking towards the long-term, you should ask yourself, "Is this authentic to me? Is it myself that I'm projecting?" And then, "Am I productizing it? Am I scaling it? Am I scaling with labor or capital or code or media?" It's a very handy, simple mnemonic.

What is this podcast? This is a podcast called Naval. I'm literally productizing myself with a podcast.

Nivi: You want to figure out what you're uniquely good at—or what you uniquely are—and apply as much leverage as possible. So making money isn't even something you do. It's not a skill. It's who you are, stamped out a million times.

Find hobbies that make you rich, fit and creative

Naval: Making money should be a function of your identity and what you like to do. Another tweet I really liked was, “Find three hobbies: One that makes you money, one that keeps you fit, and one that makes you creative.”

I would change that slightly. I would say: One that makes you money, one that makes you fit, and one that makes you smarter. So in my case, my hobbies would be reading and making money, as I love working with startups, investing in them, brainstorming them, starting them. I love the ideation and initial creation phase around startups.

On the hobby that keeps you fit, I don’t really have one. The closest thing I have is yoga, but that’s where I sort of fell apart. I think people who, early in life, discover something like surfing or swimming or tennis or some kind of a sport they continue doing throughout most of their life are very lucky, because they found a hobby that will make them fit.

THERE ARE NO GET RICH QUICK SCHEMES

Nivi: We skipped one tweet because I wanted to cover all of the tweets on the topic of the long-term. The tweet we skipped: “There are no get rich quick schemes. That’s just someone else getting rich off you.”

Naval: This goes back to the world being an efficient place. If there’s an easy way to get rich, it’s already been exploited. There are a lot of people who will sell you ideas and schemes on how to make money. But they’re always selling you some \$79.95 course or some audiobook or seminar.

Which is fine. Everyone needs to eat. People need to make a living. They might actually have really good tips. If they’re giving you actionable, high-quality advice that acknowledges it’s a difficult journey and will take a lot of time, then I think it’s realistic.

But if they’re selling you some get rich quick scheme—whether it’s crypto or whether it’s an online business or seminar—they’re just making money off you. That’s their get rich quick scheme. It’s not necessarily going to work for you.

We don't have ads because it would ruin our credibility

One of the things about this whole tweetstorm and podcast is that we don't have ads. We don't charge for anything. We don't sell anything. Not because I don't want to make more money—it's always nice to make more money; we're doing work here—but because it would completely destroy the credibility of the enterprise. If I say, "I know how to get rich, and I'm going to sell that to you," then it ruins it.

When I was young, one of my favorite books on the topic was "How To Get Rich," by Felix Dennis, the founder of Maxim Magazine. He had a lot of crazy stuff in there. But he had some really good insights too.

Whenever I read something by him or by GoDaddy founder Bob Parsons or Andrew Carnegie—people who are already very wealthy, and they clearly made their wealth in other fields, not by selling the how-to-get-rich line—they have a credibility. You just trust them.

They're not trying to make money off of you. They're obviously trying to win some status and some ego—you always have to have a motivation for doing something. But at least that's a cleaner reason and why they're probably not lying. They're probably not fooling you. They're not snowing you.

Every founder has to lie to every employee

At some level every founder has to lie to every employee of the company they have. They have to convince them, "It's better for you to work for me than to do what I did and go work for yourself."

I've always had a hard time with that.

The only honest way to do this, in my opinion, is to tell the entrepreneurs I recruit: "You're going to be entrepreneurial in this company, and the day you're ready to start your own next thing, I'm going to support you. I'm never going to get in the way of you starting a company. But this can be a good place for you to learn how to build a good team and build a good culture; how to find product-market fit; how to perfect your skills; and to meet some amazing people while you figure out exactly what it is you're going to do. Because positioning, timing and deliberation are very important when starting a company."

What I've never been able to do is to look them in the face and say, "You must be at your desk by 8 a.m." Because I'm not going to be at my desk by 8 a.m. I want my freedom. I've never been able to say to them, "You're great at being a director today, and you'll be a VP tomorrow," putting them into that cold career path track. Because I don't believe in it myself.

Anyone giving advice on how to get rich should have made their money elsewhere

If anyone is giving advice on how to get rich and they're also making money off of it, they should have made their money elsewhere. You don't want to learn how to be fit from a fat person. You don't want to learn how to be happy from a depressed person. So, you don't want to learn how to be rich from a poor person. But you also don't want to learn how to be rich from somebody who makes their money by telling people how to be rich. It's suspect.

Nivi: Any time you see somebody who's gotten rich following some guru's advice on getting rich, remember that in any random process, if you run it long enough and if enough people participate in it, you will always get every single possible outcome with probability one.

Naval: There's a lot of random error in there. This is why you have to absolutely and completely ignore business journalists and economist academics when they talk about private companies.

I won't name names, but when a famous economist rails on Bitcoin, or when a business journalist attacks the latest company that's IPO'ing, it's complete nonsense. Those people have never built anything. They're professional critics. They don't know anything about making money. All they know is how to criticize and get pageviews. And you're literally becoming dumber by reading them. You're burning neurons.

I'll leave you with a quote from Nassim Taleb that I liked. He said, "To become a philosopher king, start with being a king, not being a philosopher."

Nivi: I'm glad you brought up Taleb, because I was going to finish this by saying: remember the title of his first book, "Fooled By Randomness."

Naval: One of the reasons we're a little vague in this podcast is because we're trying to lay down principles that are timeless, as opposed to giving you the winning lottery ticket numbers from yesterday.

A CALM MIND, A FIT BODY, A HOUSE FULL OF LOVE

Nivi: The last tweet on the topic of working for the long-term is: “When you’re finally wealthy, you’ll realize it wasn’t what you were seeking in the first place. But that’s for another day.”

Naval: That’s a multi-hour topic in and of itself. First of all, I thought it was a really clever way to end the whole thing. It disarms a whole set of people who say, “What’s the point of getting rich?” There are a lot of people who like to virtue signal against the idea of wealth creation or making money.

It’s also true. Yes, money will solve all your money problems. But it doesn’t get you everywhere.

The first thing you realize when you’ve made a bunch of money is that you’re still the same person. If you’re happy, you’re happy. If you’re unhappy, you’re unhappy. If you’re calm and fulfilled and peaceful, you’re still that same person. I know lots of very rich people who are extremely out of shape. I know lots of rich people who have really bad family lives. I know lots of rich people who are internally a mess.

A calm mind, a fit body and a house full of love must be earned

I would lean on another tweet that I put out. When I think back on it, I think it’s my favorite tweet. It’s not necessarily the most insightful. It’s not necessarily the most helpful. It’s not even the one I think about the most. But when I look at it, there’s such a certain truth in there that it resonates. And that is: “A fit body, a calm mind, a house full of love. These things cannot be bought—they must be earned.”

Even if you have all the money in the world, you can’t have those three things. Jeff Bezos still has to work out. He still has to work on his marriage. And his internal mental state still very much won’t be controlled by external events. It’s going to be based on how calm and peaceful he is inside.

So I think those three things—your health, your mental health and your close relationships—are things you have to cultivate. They can bring you a lot more peace and happiness than any amount of money ever will.

Practical advice for a calmer internal state

How to get there is a tweetstorm I've been working on. I have probably 100 tweets on it. It's very hard to say anything on the topic without getting attacked from 50 different directions, especially these days on Twitter. So I've been hesitant to do it. I want to target it for a very specific kind of person.

There's a bunch of people who don't believe working on your internal state is useful. They're too focused on the external. And that's fine, there's nothing wrong with that. That's who the "How to Get Rich" tweetstorm is for. There's a bunch of people who believe the only thing worth working on is complete liberation. Like, you become the Buddha. They'll attack anything in the middle as being useless. That's fine, too. But most people aren't there.

I want to create a tweetstorm that offers practical advice for everyday people who want a calmer internal state. A set of understandings, realizations, half-truths and truths, that if you were to imbibe them properly—and, again, these are pointers to ideas you already have and experiences you already have—that if you keep these top of mind, slowly but steadily it will help you with certain realizations that will lead you to a calmer internal state. That's what I want to work on.

Fitness is another big one, I'm just not the expert there. There are plenty of good people on Twitter that who are better at fitness than me.

A lot of divorces happen over money, a lot of battles happen over internal anger

I think a loving household and relationships actually fall naturally out of the other things. If you have a calm mind and you've already made money, you should have good relationships. There's no reason why you shouldn't. A lot of divorces happen over money. Unfortunately, that's just the reality of it. Having money removes that part of it.

A lot of external battles happen because your internal state is not good. When you're naturally internally peaceful you're going to pick fewer fights. You're going to be more loving without expecting anything in return. That will take care of things on the external-relationship front.

Nivi: To summarize: Money solves your money problems. Money buys you freedom in the material world. And money lets you not do the things you don't want to do.

Naval: Yeah. To me the ultimate purpose of money is so you don't have to be in a specific place, at a specific time, doing anything you don't want to do.

REJECT MOST ADVICE

Nivi: One of the tweets from the cutting-room floor was: "Avoid people who got rich quickly. They're just giving you their winning lottery ticket numbers."

Naval: This is generally true of most advice. It goes back to Scott Adams—systems not goals. If you ask a successful person what worked for them, they often read out the exact set of things that worked for them, which might not apply to you. They're just reading you their winning lottery ticket numbers.

It's a little glib. There is something to be learned, but you can't take their exact circumstance and map it onto yours. The best founders I know read and listen to everyone. But then they ignore everyone and make up their own mind.

They have their own internal model of how to apply things to their situation. And they do not hesitate to discard information. If you survey enough people, all of the advice will cancel to zero.

You have to have your own point of view. When something is sent your way, you have to quickly decide: Is it true? Is it true outside of the context of how that person applied it? Is it true in my context? And then, Do I want to apply it?

You have to reject most advice. But you have to listen to enough of it, and read enough of it, to know what to reject and what to accept.

Even in this podcast, you should examine everything. If something doesn't feel true to you, put it down. Set it aside. If too many things seem untrue, delete this podcast.

Advice offers anecdotes to recall later, when you get your own experience

Nivi: I think the most dangerous part of taking advice is that the person who gave it to you isn't going to be around to tell you when it doesn't apply any more.

Naval: I view the purpose of advice a little differently than most people. I view it as helping me have anecdotes and maxims that I can recall when I have my own direct experience and say, "Ah, that's what that person meant."

Ninety percent of my tweets are maxims that become mental hooks to remind me when I'm in that situation again.

Like, "Oh, I'm the one who tweeted, 'If you can't see yourself working with someone for life, then don't work with them for a day.'" As soon as I know I'm not going to be working with someone 10 years from now, then I have to start extricating myself from that relationship or investing less effort in it.

I use tweets to compress my own learnings. Your brain space is finite. You have finite neurons. You can think of these as pointers, addresses, mnemonics to help you remember deep-seated principles where you have the underlying experience to back it up.

If you don't have the underlying experience, then it reads like a collection of quotes. It's cool. It's inspirational for a moment. Maybe you make a nice poster out of it. But then you forget it and move on.

These are compact ways for you to recall your own knowledge.

EVENTUALLY YOU WILL GET WHAT YOU DESERVE

Nivi: We're talking about working for the long-term. The next tweet on that topic: "Apply specific knowledge, with leverage, and eventually you will get what you deserve."

I would add: Apply judgment, apply accountability, and apply the skill of reading.

Naval: This one is a glib way of saying, “It takes time.” Once you have all of the pieces in place, there’s still an indeterminate amount of time you have to put in. And if you’re counting, you’ll run out of patience before it arrives.

You have to make sure you give these things time. Life is long.

Charlie Munger had a line on this. Somebody asked him about making money. He said what the questioner actually was asking was, “How can I become like you, except faster?”

Everybody wants it immediately. But the world is an efficient place. Immediate doesn’t work. You have to put in the time. You have to put in the hours. You have to put yourself in that position with specific knowledge, accountability, leverage and an authentic skill-set in order to be the best in the world at what you do.

And then you have to enjoy it and keep doing it and doing it and doing it. Don’t keep track. Don’t keep count. Because if you do, you will run out of time.

Looking back on my career, the people who I identified as brilliant and hardworking two decades ago are all successful now, almost without exception. On a long enough timescale, you will get paid.

But it can easily be 10 or 20 years. Sometimes it’s five. If it’s five, or three, and it’s a friend of yours who got there, it can drive you insane. But those are exceptions. And for every winner, there are multiple failures.

One thing that’s important in entrepreneurship: You just have to be right once. You get many, many shots on goal. You can take a shot on goal every three to five years, maybe every 10 at the slowest. Or once every year at the fastest, depending on how you’re iterating with startups. But you only have to be right once.

What are you really good at, that the market values?

Nivi: Your eventual outcome will be equal to something like the distinctiveness of your specific knowledge; times how much leverage you can apply to that knowledge; times how often your judgment is correct; times how singularly accountable you are for the outcome; times how much society values what

you're doing. Then you compound that with how long you can keep doing it and how long you can keep improving it through reading and learning.

Naval: That's a really good way to summarize it. It's worth trying to sketch that equation out.

That said, people try to apply mathematics to what is really philosophy. I've seen this happen, where I say one thing and then I say another thing that seems contradictory if you treat it as math. But it's obviously in a different context.

People will say, "You say, 'Desire is suffering.'" You know, the Buddhist saying. "And then you 'All greatness comes from suffering.' So does that mean all greatness comes from desire?" This isn't math. You can't just carry variables around and form absolute logical outputs. You have to know when to apply things.

One can't get too analytical about it.

It's what a physicist would call "false precision." When you take two made-up estimates and multiply them together, you get four degrees of precision. Those decimal points don't actually count. You don't have that data. You don't have that knowledge. The more estimated variables you have, the greater the error in the model.

Adding more complexity to your decision-making process gets you a worse answer. You're better off picking the single biggest thing or two. Ask yourself: What am I really good at, according to observation and people I trust, that the market values?

Those two variables alone are probably good enough. If you're good at it, you'll keep it up. You'll develop the judgment. If you're good at it and you like to do it, eventually people will give you the resources and you won't be afraid to take on accountability. So the other pieces will fall into place.

Product-market fit is inevitable if you're doing something you love and the market wants it.

PLAY STUPID GAMES, WIN STUPID PRIZES

Nivi: When you're being authentic, you don't mind competition that much. It pisses you off and inspires some fear, jealousy and other emotions. But you don't really mind because you're oriented towards the goal and the mission. Worst-case, you might get some ideas from them. And often there are ways to work with the competition in a positive way that ends up increasing the size of the market for you.

Naval: It depends on the nature of the business. The best Silicon Valley tech industry businesses tend to be winner-take-all. When you see competition, it can make you fly into a rage. Because it really does endanger everything you've built.

If I'm opening a restaurant and a more interesting version of the same restaurant opens in a different town, that's fantastic. I'm going to copy what's working and drop what's not working. So it depends on the nature of the business.

Often, businesses that seem to be in direct competition really aren't. They end up adjacent or slightly different. You're one step away from a completely different business, and sometimes you need to take that step. You're not going to take it if you're busy fighting over a booby prize.

You're playing a stupid game. You're going to win a stupid prize. It's not obvious right now because you're blinded by competition. But three years from now, it'll be obvious.

My first company got caught in the wrong game

One of my first startups was Epinions, an online product review site that was independent of Amazon. That space eventually turned into TripAdvisor and Yelp, which is where we should have gone.

We should have done more local reviews. A review of a scarce item like a local restaurant is more valuable than one of an item like a camera that has 1,000 reviews on Amazon.

Before we could get there, we got caught up in the comparison-shopping game. We merged with DealTime and competed with a bunch of price-comparison engines—mySimon, PriceGrabber, NexTag and Bizrate, which became Shopzilla. We were caught in fierce competition with each other.

That whole space went to zero because Amazon won e-tail completely. There was no need for price comparison. Everyone just went to Amazon.

We got the booby prize because we were caught up in competition with a bunch of our peers. We should have been looking at what the consumer really wanted and being authentic to ourselves, which was reviews, not price comparison. We should have gone further into esoteric items where customers had less data and wanted reviews more badly.

If we stayed authentic to ourselves, we would have done better.

ESCAPE COMPETITION THROUGH AUTHENTICITY

Nivi: Let's discuss your tweet: "Escape competition through authenticity." It sounds like part of this is a search for who you are.

Naval: It's both a search and a recognition. Sometimes when we search our egos, we want to be something that we're not. Our friends and family are actually better at telling us who we are. Looking back at what we've done is a better indicator of who we are.

Peter Thiel talks a lot about how competition is besides the point. It's counterproductive. We're highly memetic creatures. We copy everybody around us. We copy our desires from them.

If everyone around me is a great artist, I want to be an artist. If everyone around me is a great businessperson, I want to be a businessperson. If everybody around me is a social activist, I want to be a social activist. That's where my self-esteem will come from.

You have to be careful when you get caught up in status games. You end up competing over things that aren't worth competing over.

Peter Thiel talks about how he was going to be a law clerk because everybody at law school wanted to clerk for a Supreme Court justice or some famous judge. He got rejected, and that's what made him go into business. It helped him break out of a lesser game and into a greater game.

Sometimes you get trapped in the wrong game because you're competing. The best way to escape competition—to get away from the specter of competition, which is not just stressful and nerve-wracking but also will drive you to the wrong answer—is to be authentic to yourself.

No one can compete with you on being you

If you are building and marketing something that's an extension of who you are, no one can compete with you. Who's going to compete with Joe Rogan or Scott Adams? It's impossible. Is somebody else going to write a better Dilbert? No. Is someone going to compete with Bill Watterson and create a better Calvin and Hobbes? No.

Artists are, by definition, authentic. Entrepreneurs are authentic, too. Who's going to be Elon Musk? Who's going to be Jack Dorsey? These people are authentic, and the businesses and products they create are authentic to their desires and means.

If somebody else came along and started launching rockets, I don't think it would faze Elon one bit. He's still going to get to Mars. Because that's his mission, insane as it seems. He's going to accomplish it.

Authenticity naturally gets you away from competition. Does it mean that you want to be authentic to the point where there's no product-market fit? It may turn out that you're the best juggler on a unicycle. But maybe there isn't much of a market for that, even with YouTube videos. So you have to adjust until you find product-market fit.

At least lean towards authenticity, towards getting away from competition. Competition leads to copy-cattening and playing the completely wrong game.

In entrepreneurship, the masses are never right

In entrepreneurship, the masses are never right. If the masses knew how to build great things and create great wealth, we'd all be rich by now.

When you see a lot of competition, sometimes that indicates the masses have already arrived. It's already competed over too much. Or it's the wrong trend to begin with.

On the other hand, if the whole market is empty, that can be a warning indicator. It can indicate you've gone too authentic and should focus more on the product-market part of founder-product-market fit.

There's a balance you have to find. Generally, people will make the mistake of paying too much attention to the competition. The great founders tend to be authentic iconoclasts.

Combine your vocation and avocation

Nivi: Do you think one way of getting to authenticity is by finding five or six various skills you already do and stacking them on top of each other, maybe not even in any purposeful way? If you are expressing who you are, you're going to be expressing all of these skills anyway.

Naval: If you are successful, in the long-term you'll find you're almost doing all of your hobbies for a living, no matter what they are. As Robert Frost said, "my goal in life is to unite my avocation with my vocation." That's really where life is going to lead you anyway.

You're right about the skill stack. Everyone has multiple skills. We aren't one-dimensional creatures, even though that's how we portray ourselves in online profiles to get employed. You meet somebody and they say, "I'm a banker." Or, "I'm a bartender. Or "I'm a barber."

Specialize in being you

But people are multivariate. They have a lot of skills. One banker might be good at finance. Another one might be good at sales. A third one might be good at macroeconomic trends and have a feel for markets. Another one might be really good at picking individual stocks. Another might be good at maintaining relationships, rather than selling new relationships. Everyone's going to have various niches. And you're going to have multiple niches. It's not going to be just one.

As you go through your career, you'll find you gravitate towards the things you're good at, which by definition are the things you enjoy doing. Otherwise, you wouldn't be good at them. You wouldn't have put in the time.

Other people will push you towards the things you're good at, too. Because your smart bosses, co-workers and investors will realize you're world-class in this one thing. And you can recruit people to help you with other things.

Ideally, you want to end up specializing in being you.

KEEP REDEFINING WHAT YOU DO

Nivi: We talked about the importance of working hard and valuing your time. Next, there are a few tweets on the topic of working for the long-term. The first tweet is: "Become the best in the world at what you do. Keep redefining what you do until this is true."

Naval: If you really want to get paid in this world, you want to be number one at whatever you do. It can be niche—that's the point. You can literally get paid for just being you.

Some of the more successful people in the world are that way. Oprah gets paid for being Oprah. Joe Rogan gets paid for being Joe Rogan. They're being authentic to themselves.

You want to be number one. And you want to keep changing what you do until you're number one. You can't just pick something arbitrary. You can't say, "I'm going to be the fastest runner in the world," and now you have to beat Usain Bolt. That's too hard of a problem.

Keep changing your objective until it arrives at your specific knowledge, skill sets, position, capabilities, location and interests. Your objective and skills should converge to make you number one.

When you're searching for what to do, you have two different foci to keep in mind. One is, "I want to be the best at what I do." The second is, "What I do is flexible, so that I'm the best at it."

You want to arrive at a comfortable place where you feel, “This is something I can be amazing at, while still being authentic to who I am.”

It’s going to be a long journey. But now you know how to think about it.

Find founder-product-market fit

The most important thing for any company is to find product-market fit. But the most important thing for any entrepreneur is to find founder-product-market fit, where you are naturally inclined to build the right product for a market. That’s a three-foci problem. You have to make all three work at once.

If you want to be successful in life, you have to get comfortable managing multi-variate problems and multiple-objective functions at once. This is one of those cases where you have to map at least two or three at once.

BE TOO BUSY TO ‘DO COFFEE’

Naval: Another tweet was: “You should be too busy to ‘do coffee,’ while still keeping an uncluttered calendar.”

People who know me know I’m famous for simultaneously doing two things.

First, I keep a very clean calendar. I have almost no meetings on it. When some people see my calendar, they almost weep.

Second, I’m busy all the time. I’m always doing something. It’s usually work-related. It’s whatever high-impact thing that needs to be done, that I’m most inspired to do.

The only way to do that is to constantly, and ruthlessly, decline meetings.

People want to “do coffee” and build relationships. That’s fine early in your career, when you’re still exploring. But later in your career—when you’re exploiting, and there are more things coming at you than you have time for—you have to ruthlessly cut meetings out of your life.

Ruthlessly cut meetings

If someone wants a meeting, see if they will do a call instead. If they want to call, see if they will email instead. If they want to email, see if they will text instead. And you probably should ignore most text messages—unless they’re true emergencies.

You have to be utterly ruthless about dodging meetings. When you do meetings, make them walking meetings. Do standing meetings. Keep them short, actionable and small. Nothing is getting done in a meeting with eight people around a conference table. You are literally dying one hour at a time.

Nivi: “Doing coffee” reminds me of an old quote, I think from Steve Jobs, when someone asked him why Apple didn’t come to a convention. His response was something like, “Because we wouldn’t be here working.”

Naval: I used to have a tough time turning people down for meetings. Now I just tell them outright, “I don’t do non-transactional meetings. I don’t do meetings without a strict agenda. I don’t do meetings unless we absolutely have to.”

Nivi used to do this. When people asked us for get-to-know-you meetings, he would say, “We don’t do meetings unless it’s life-and-death urgent.” The person has to respond, “Yeah, it’s life-and-death urgent” or there’s no meeting.

People will meet with you when you have proof of work

Busy people will take your meeting when you have something important or valuable. But you have to come with a proper calling card. It should be: “Here’s what I’ve done. Here’s what I can show you. Let’s meet if this is useful to you, and I’ll be respectful of your time.”

You have to build up credibility. For example, when a tech investor looks at a startup, the first thing they want to see is evidence of product progress. They don't just want to see a slide deck. Product progress is the entrepreneur's resume. It's an unfake-able resume.

You have to do the work. To use a crypto analogy, you have to have proof of work. If you have that and you truly have something interesting, then you shouldn't hesitate to put it together in an email and send it. Even then, when asking for a meeting, you want to be actionable.

Free your time and mind

If you think you're going to "make it" by networking and attending a bunch of meetings, you're probably wrong. Networking can be important early in your career. And you can get serendipitous with meetings. But the odds are pretty low.

When you meet people hoping for that lucky break, you're relying on Type One luck, which is blind luck, and Type Two luck, which is hustle luck.

But you're not getting Type Three or Type Four luck, which are the better kinds. This is where you spend time developing a reputation and working on something. You develop a unique point of view and are able to spot opportunities that others can't.

A busy calendar and a busy mind will destroy your ability to do great things in this world. If you want to do great things—whether you're a musician or entrepreneur or investor—you need free time and a free mind.

WORK AS HARD AS YOU CAN

Naval: Let's talk about hard work. There's a battle that happens on Twitter a lot. Should you work hard or should you not? David Heinemeier Hansson says, "It's like you're slave-driving people." Keith Rabois says, "No, all the great founders worked their fingers to the bone."

They're talking past each other.

First of all, they're talking about two different things. David is talking about employees and a lifestyle business. If you're doing that, your number one priority is not getting wealthy. You have a job, a family and also your life.

Keith is talking about the Olympics of startups. He's talking about the person going for the gold medal and trying to build a multi-billion dollar public company. That person has to get everything right. They have to have great judgment. They have to pick the right thing to work on. They have to recruit the right team. They have to work crazy hard. They're engaged in a competitive sprint.

If getting wealthy is your goal, you're going to have to work as hard as you can. But hard work is no substitute for who you work with and what you work on. Those are the most important things.

What you work on and who you work with are more important

Marc Andreessen came up with the concept of the "product-market fit." I would expand that to "product-market-founder fit," taking into account how well a founder is personally suited to the business. The combination of the three should be your overwhelming goal.

You can save a lot of time by picking the right area to work in. Picking the right people to work with is the next most important piece. Third comes how hard you work. They are like three legs of a stool. If you shortchange any one of them, the whole stool is going to fall. You can't easily pick one over the other.

When you're building a business, or a career, first figure out: "What should I be doing? Where is a market emerging? What's a product I can build that I'm excited to work on, where I have specific knowledge?"

No matter how high your bar is, raise it

Second, surround yourself with the best people possible. If there's someone greater out there to work with, go work with them. When people ask for advice about choosing the right startup to join, I say, "Pick the one that's going to have the best alumni network for you in the future." Look at the PayPal mafia — they worked with a bunch of geniuses, so they all got rich. Pick the people with the highest intelligence, energy and integrity that you can find.

And no matter how high your bar is, raise it.

Finally, once you've picked the right thing to work on and the right people, work as hard as you can.

Nobody really works 80 hours a week

This is where the mythology gets a little crazy. People who say they work 80-hour weeks, or even 120-hour weeks, often are just status signaling. It's showing off. Nobody really works 80 to 120 hours a week at high output, with mental clarity. Your brain breaks down. You won't have good ideas.

The way people tend to work most effectively, especially in knowledge work, is to sprint as hard as they can while they feel inspired to work, and then rest. They take long breaks.

It's more like a lion hunting and less like a marathoner running. You sprint and then you rest. You reassess and then you try again. You end up building a marathon of sprints.

Inspiration is perishable

Inspiration is perishable. When you have inspiration, act on it right then and there.

If I'm inspired to write a blog post or publish a tweetstorm, I should do it right away. Otherwise, it's not going to get out there. I won't come back to it. Inspiration is a beautiful and powerful thing. When you have it, seize it.

Impatience with actions, patience with results

People talk about impatience. When do you know to be impatient? When do you know to be patient? My glib tweet on this was: "Impatience with actions, patience with results." I think that's a good philosophy for life.

Anything you have to do, get it done. Why wait? You're not getting any younger.

You don't want to spend your life waiting in line. You don't want to spend it traveling back and forth. You don't want to spend it doing things that aren't part of your mission.

When you do these things, do them as quickly as you can and with your full attention so you do them well. Then be patient with the results because you're dealing with complex systems and a lot of people.

It takes a long time for markets to adopt products. It takes time for people to get comfortable working with each other. It takes time for great products to emerge as you polish away.

Impatience with actions, patience with results.

If I discover a problem in one of my businesses, I won't sleep until the resolution is at least in motion. If I'm on the board of a company, I'll call the CEO. If I'm running the company, I'll call my reports. If I'm responsible, I'll get on it, right then and there, and solve it.

If I don't solve a problem the moment it happens—or if I don't move towards solving it—I have no peace. I have no rest. I have no happiness until the problem is solved. So I solve it as quickly as possible. I literally won't sleep until it's solved—maybe that's just a personal characteristic. But it's worked out well in business.

SET AN ASPIRATIONAL HOURLY RATE

Nivi: We covered the skills you need to get rich. They included specific knowledge, accountability, leverage, judgment and life-long learning. Let's talk about the importance of working hard and valuing your time.

Naval: No one is going to value you more than you value you. Set a high personal hourly rate, and stick to it. When I was young, I decided I was worth a lot more than the market thought I was worth. And I started treating myself that way.

Factor your time into every decision. Say you value your time at \$100 an hour. If you decide to spend an hour driving across town to get something, you're effectively throwing away \$100. Are you going to do that?

Say you buy something from Amazon and they screw it up. Is it worth your time to return it? Is it worth the mental hassle? Keep in mind that you will have less time for work, including mentally high-output work. Do you want to use that time running errands and solving little problems? Or do you want to save it for the big stuff?

The great scientists were terrible at managing their home lives. None of them had an organized room, or made social events on time, or sent their thank-you cards.

You can't penny pinch your way to wealth

You can spend your life however you want. But if you want to get rich, it has to be your top priority. It has to come before anything else, which means you can't penny-pinch. This is what people don't understand.

You can penny-pinch your way to basic sustenance. You can keep expenses low and maybe retire early. That's perfectly valid. But we're here to talk about wealth creation. If you're going to create wealth, it has to be your number-one, overwhelming priority.

My aspirational rate was \$5,000/hr

Fast-forward to your wealthy self and pick an intermediate hourly rate. Before I had any real money and you could hire me, I set an aspirational rate of \$5,000 an hour.

Of course, I still ended up doing stupid things like arguing with the electrician or returning the broken speaker. But I shouldn't have. And I did a lot less of it my friends. I would make a theatrical show out of throwing something in the trash or giving it to Salvation Army, rather than returning it or trying to fix it.

I would argue with girlfriends, “I don’t do that. That’s not a problem that I solve.” I still argue that today with my wife and with my mother, when she hands me little to-do’s. I say, “I would rather hire you an assistant.” This was true even when I didn’t have money.

If you can outsource something for less than your hourly rate, do it

Another way to think about this: If you can outsource something—or not do something—for less than your hourly rate, outsource it or don’t do it. If you can hire someone to do it for less than your hourly rate, hire them. That includes things like cooking. You may want to make your own healthy, home-cooked meals. But if you can outsource it, do that instead.

People say, “What about the joy of life? What about getting it right, just your way?” Sure, you can do that. But you’re not going to be wealthy, because you’ve made something else a priority.

Paul Graham said it well for Y Combinator startups. He said you should be working on your product and getting product-market fit, and you should be exercising and eating healthy. That’s about it. That’s all you have time for while you’re on this mission.

Your hourly rate should seem absurdly high

Set a very high aspirational hourly rate for yourself, and stick to it. It should seem and feel absurdly high. If it doesn’t, it’s not high enough. Whatever you pick, my advice is to raise it.

For the longest time, I used \$5,000 an hour. If you extrapolate that out as an annual salary, it’s multiple millions of dollars per year. I actually think I’ve beaten it, which is interesting given that I’m not the hardest worker. I work through bursts of energy when I’m motivated to work on something.

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JUDGMENT IS THE DECISIVE SKILL

Nivi: We spoke about specific knowledge, we talked about accountability, we talked about leverage. The last skill that Naval talks about in his tweetstorm is judgment, where he says, that “Leverage is a force multiplier for your judgment.”

Naval: We are now living in an age of nearly infinite leverage, and all the great fortunes are created through leverage. Your first job is to go and obtain leverage, and you can obtain leverage through permission by getting people to work for you, or by raising capital.

Or you can get leverage permissionlessly by learning how to code or becoming good communicator and podcasting, broadcasting, creating videos, writing, etc.

That's how you get leverage, but once you have leverage, what do you do with it? Well, the first part of your career's spent hustling to get leverage. Once you have the leverage, then you wanna slow down a bit, because your judgment really matters.

It's like you've gone from steering your sailboat around to now you're steering an ocean liner or a tanker. You have a lot more at risk, but you have a lot more to gain as well. You're carrying a much higher payload. In an age of infinite leverage, judgment becomes the most important skill.

Warren Buffett is so wealthy now because of his judgment. Even if you were to take away all of Warren's money, tomorrow, investors would come out of the woodwork and hand him a \$100 billion because they know his judgment is so good, and they would give him a big chunk of that \$100 billion to invest.

Everything else you do is setting you up to apply judgment

Ultimately, everything else that you do is actually setting you up to apply your judgment. One of the big things that people rail on is CEO pay. For sure there's crony capitalism that goes on where these CEOs control their boards and the boards give them too much money.

But, there are certain CEOs who definitely earned their keep because their judgment is better. If you're steering a big ship, if you're steering Google or Apple, and your judgment is 10 or 20 percent better than the next person's, society will literally pay you hundreds of millions of dollars more, because you're steering a \$100 billion ship.

If you're on course 10 or 20 percent of the time more often than the other person, the compounding results on that hundreds of billions of dollars you're managing will be so large that your CEO pay will be dwarfed in comparison.

Demonstrated judgment, credibility around the judgment, is so critical. Warren Buffett wins here because he has massive credibility. He's been highly accountable. He's been right over and over in the public domain. He's built a reputation for very high integrity, so you can trust him.

A person like that, people will throw infinite leverage behind him because of his judgment. Nobody asks him how hard he works; nobody asks him when he wakes up or when he goes to sleep. They're like, "Warren, just do your thing."

Judgment, especially demonstrated judgment, with high accountability, clear track record, is critical.

Judgment is knowing the long-term consequences of your actions

Nivi: Let's define judgment. I would define it as knowing the long-term effects of your decisions, or being able to predict the long-term effects of your decisions.

Naval: It's funny. My definition of wisdom is knowing the long term consequences of your actions, so they're not all that different. Wisdom is just judgment on a personal domain.

Wisdom applied to external problems I think is judgment. They're highly linked. But, yes, it's knowing the long term consequences of your actions and then making the right decision to capitalize on that.

Without experience, judgment is often less than useless

Judgment is very hard to build up. This is where both intellect and experience come in play.

There are many problems with the so-called intellectuals in the ivory tower, but one of the reasons why Nassim Taleb rails against them is because they have no skin in the game. They have no real-world experience, so they just apply purely intellect.

Intellect without any experience is often worse than useless because you get the confidence that the intellect gives you, and you get some of the credibility, but because you had no skin in the game, and you had no real experience, and no real accountability, you're just throwing darts.

The real world is always far, far more complex than we can intellectualize. Especially all the interesting, fast-moving edge domains and problems, you can't get there without experience. If you are smart and you iterate fast, it's not even you put 10,000 hours into something, but you take 10,000 tries at something.

The people with the best judgment are among the least emotional

If you are smart and you have a lot of quick iterations, and you try to keep your emotions out of it, the people with the best judgment are actually among the least emotional. A lot of the best investors are considered almost robotic in that regard, but I wouldn't be surprised if even the best entrepreneurs often come across as unemotional.

There is sort of this archetype of the passionate entrepreneur, and yeah, they have to care about what they're doing, but they also have to see very clearly what's actually happening. The thing that prevents you from seeing what's actually happening are your emotions. Our emotions are constantly clouding our judgment, and in investing, or in running companies, or in building products, or being an entrepreneur, emotions really get in the way.

Emotions are what prevent you from seeing what's actually happening, until you can no longer resist the truth of what's happening, until it becomes too sudden, and then you're forced into suffering; which is sort of a breaking of this fantasy that you had put together.

Nivi: To try and connect some of these concepts, I would say that, first, you're accountable for your judgment. Judgment is the exercise of wisdom. Wisdom comes from experience; and that experience can be accelerated through short iterations.

A lot of the top investors often sound like philosophers

Naval: And the reason why a lot of the top investors, a lot of the value investors, like if you read Jeremy Grantham, or you read Warren Buffet, or you read up on Michael Burry, these people sound like philosophers, or they are philosophers, or they're reading a lot of history books or science books.

Like what are they doing, shouldn't they be reading investment books. No. Investment books are the worst place to learn about investment, because investment is a real-world activity that is highly multi-variate, all the advantages are always being competed away. It's always on the cutting-edge.

What you actually just need is very, very broad-based judgment and thinking. The best way to do that is to study everything, including a lot of philosophy. Philosophy also makes you more stoic, makes you less emotional, and so you make better decisions; you have better judgment.

The more outraged someone is, the worse their judgment

One simple thing is I see ... I go out on Twitter and it seems like half of Twitter is outraged at something at all times. You can go within someone's Twitter feed and get at least some semblance of what it must be like to be in their head all the time.

The more outraged somebody is, I guarantee you, the worse their judgment is. If someone's constantly tweeting political outrage, and just see like an angry person getting into fights, you don't want to hand this person the keys to your car, let alone the keys to your company.

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EXAMPLE: FROM LABORER TO ENTREPRENEUR

Naval: The tweetstorm is very abstract. It's deliberately meant to be broadly applicable to all kinds of different domains and disciplines and time periods and places. But sometimes it's hard to work without a concrete example. So let's go concrete for a minute.

Look at the real estate business. You could start at the bottom, let's say you're a day laborer. You come in, you fix people's houses. Someone orders you around, tells you, "Break that piece of rock. Sand that piece of wood. Put that thing over there."

There's just all these menial jobs that go on, on a construction site. If you're working one of those jobs, unless you're a skilled trade, say, a carpenter or electrician, you don't really have specific knowledge.

Even a carpenter or an electrician is not that specific because other people can be trained how to do it. You can be replaced. You get paid your \$15, \$20, \$25, \$50, if you're really lucky, \$75 an hour, but that's about it.

You don't have any leverage other than from the tools that you're using. If you're driving a bulldozer that's better than doing it with your hands. A day laborer in India makes a lot less because they have no tool leverage.

You don't have much accountability. You're a faceless cog in a construction crew and the owner of the house or the buyer of the house doesn't know or care that you worked on it.

General contractors get equity, but they're also taking risk

One step up from that, you might have a contractor, like a general contractor who someone hires to come and fix and repair and build up their house. That general contractor is taking accountability; they're taking responsibility.

Now let's say they got paid \$250,000 for the job. Sorry, I'm using Bay Area prices, so maybe I'll go rest of the world prices, \$100,000 for the job to fix up a house, and it actually costs the general contractor, all said and done, \$70,000. That contractor's going to pocket that remaining \$30,000.

They got the upside. They got the equity but they're also taking accountability and risk. If the project runs over and there's losses, then they eat the losses. But you see, just the accountability gives them some form of additional potential income.

Then, they also have labor leverage because they have a bunch of people working for them. But it probably tops out right there.

Property developers pocket the profit by applying capital leverage

You can go one level above that and you can look at a property developer. This might be someone who is a contractor who did a bunch of houses, did a really good job, then decided to go into business for themselves and they go around looking for beaten down properties that have potential.

They buy them, they either raise money from investors or front it themselves, they fix the place up, and then they sell it for twice what they bought it for. Maybe they only put in 20% more, so it's a healthy profit.

So now a developer like that takes on more accountability, has more risk. They have more specific knowledge because now you have to know: which neighborhoods are worth buying in. Which lots are

actually good or which lots are bad. What makes or breaks a specific property. You have to imagine the finished house that's going to be there, even when the property itself might look really bad right now.

There's more specific knowledge, there's more accountability and risk, and now you also have capital leverage because you're also putting in money into the project. But conceivably, you could buy a piece of land or a broken-down house for \$200,000 and turn it into a million dollar mansion and pocket all the difference.

Architects, large developers and REITs are even higher in the stack

One level beyond that might be a famous architect or a developer, where just having your name on a property, because you've done so many great properties, increases its value.

One level up from that, you might be a person who decides, well, I understand real estate, and I now know enough of the dynamics of real estate that rather than just build and flip my own properties or improve my own properties, I'm gonna be a massive developer. I'm going to build entire communities.

Now another person might say, "I like that leverage, but I don't want to manage all these people. I want to do it more through capital. So I'm gonna start a real estate investment trust." That requires specific knowledge not just about investing in real estate and building real estate, but it also requires specific knowledge about the financial markets, and the capital markets, and how real estate trusts operate.

Real estate tech companies apply the maximum leverage

One level beyond that might be somebody who says, "Actually, I want to bring the maximum leverage to bear in this market, and the maximum specific knowledge." That person would say, "Well, I understand real estate, and I understand everything from basic housing construction, to building properties and selling them, to how real estate markets move and thrive, and I also understand the technology business. I understand how to recruit developers, how to write code and how to build good product, and I understand how to raise money from venture capitalists and how to return it and how all of that works."

Obviously not a single person may know this. You may pull a team together to do it where each have different skill sets, but that combined entity would have specific knowledge in technology and in real estate.

It would have massive accountability because that company's name would be a very high risk, high reward effort attached to the whole thing, and people would devote their lives to it and take on significant risk.

It would have leverage in code with lots of developers. It would have capital with investors putting money in and the founder's own capital. It would have labor of some of the highest quality labor that you can find, which is high quality engineers and designers and marketers who are working on the company.

Then you may end up with a Trulia or a RedFin or a Zillow kind of company, and then the upside could potentially be in the billions of dollars, or the hundreds of millions of dollars.

As you layer in more and more kinds of knowledge that can only be gained on the job and aren't common knowledge, and you layer in more and more accountability and risk-taking, and you layer in more and more great people working on it and more and more capital on it, and more and more code and media on it, you keep expanding the scope of the opportunity all the way from the day-laborer, who might just literally be scrappling on the ground with their hands, all the way up to somebody who started a real estate tech company and then took it public.

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PICK A BUSINESS MODEL WITH LEVERAGE

Nivi: One more question about leverage. Do you think a choice of business model or a choice of product can also bring a kind of leverage to it?

For example, pursuing a business that has network effects. Pursuing a business that has brand effects. Or other choices of business model that people could manipulate that just give you free leverage.

Naval: Yeah, there's some really good microeconomic concepts that are important to understand.

One of those is scale economies, which is the more you produce of something the cheaper it gets to make it. That's something that a lot of businesses have, Basic Economics 101.

You should try and get into a business where making Widget Number 12 is cheaper than making Widget Number 5, and making Widget Number 10,000 is a lot cheaper than the previous ones. This builds up an automatic barrier to entry against competition and getting commoditized. That's an important one.

Zero marginal cost of reproduction: producing more is free

Another one is, and this is along the same lines, but technology products especially, and media products, have this great quality where they have zero marginal cost of reproduction. Creating another copy of what you just created is free.

When somebody listens to this podcast or watches a YouTube video about this, it doesn't cost me anything for the next person who shows up. Those zero marginal cost things, they take a while to get going because you make very little money per user, but over time they can really, really add up.

Joe Rogan is working no harder on his current podcast than he was on Podcast number 1, but on Podcast number 1,100 he's making a million dollars from the podcast whereas for the previous one he probably lost money; for the first one. That's an example of zero marginal cost.

Network effects: value grows as the square of the customers

Then, the most subtle but the most important is this idea of network effects. It comes from computer networking. Bob Metcalfe, who created Ethernet, famously coined Metcalfe's Law, which is the value of a network is proportional to the square of the number of nodes in the network.

If a network of size 10 would have a value of a 100, a network of a size 100 would have a value of 10,000. It's not just 10 times more, it's 100 times more, because of the square; the difference is the square.

You want to be in a network effects business, assuming you're not number two. If you're number one in network effect business, you win everything. Example: if you look at Facebook, your friends and family social networking protocol. Who's their competitor? Nobody, because they won everything through network effects. Which is why when people say, "Well, I can just switch away from Facebook," they don't realize that network effects create natural monopolies. They're very, very powerful things.

Network effect businesses are natural monopolies

One of the dirty secrets of Silicon Valley is that a lot of the winning businesses are natural monopolies. Even ride-sharing tends towards one winner-take-all system.

Uber will always have better economics than Lyft, as long as it's moving more drivers and more riders around. Something like Google, there's basically only one viable search engine. I do like DuckDuckGo, privacy reasons, but they're just always gonna be behind because of network effects. Twitter: where else would you go for microblogging? Even YouTube has weak network effects, but they're still powerful enough that there's really no number two site that you go to, to consume your video on a regular basis. It even turns out in e-tail, Amazon Prime and kind of the convenience of stored credit cards and information creates a powerful network effect.

In a network effect, each new user adds value to the existing users

What is a network effect? Let's just define it precisely. A network effect is when each additional user adds value to the existing user base. Your users themselves are creating some value for the existing users.

The classic example that I think everybody can understand is, language. Let's say that there's 100 people living in the community and speak 10 different languages, and each person just speaks one of those 10. Well, you're having to translate all the time; it's incredibly painful. But if all 100 of you spoke the same language, it would add tremendous value.

The way that community will play out is, 10 people start off speaking 10 languages, and let's say one extra person learns English. Well, now all of a sudden, 11 people know English, so the next person comes in to learn a new language is probably going to choose English. At some point, let's say English gets to 20 or 25 people, it's done. It's just going to own the entire language marketplace, and the rest of the languages will get competed out.

Which is why, long-term, the entire world is probably going to end up speaking English and Chinese. China's closed off on the Internet, but the Internet itself is a great leveler, and people who want to communicate on the Internet are forced to speak English because the largest community of people on the Internet speaks English.

I always feel bad for my colleagues who grew up speaking foreign languages in foreign countries, because you don't have access to so many books; so many books just haven't been translated into other languages. If you only spoke French, or you only spoke German, or you only spoke Hindi, for example, you would be at a severe disadvantage in a technical education.

Invariably, if you go and get a technical education, you have to learn English just because you have to read these books that have this data that has not been translated. Languages are probably the oldest example of network effect.

Money is another example. We should all probably be using the same money, except for the fact that geographic and regulatory boundaries have created these artificial islands of money. But even then, the world tends to use a single currency as the reserve currency at most times; currently, the US dollar.

Zero marginal cost businesses can pivot into network effect businesses

Network effects are a very powerful concept, and when you're picking a business model, it's a really good idea to pick a model where you can benefit from network effects, low marginal costs, and scale economies; and these tend to go together.

Anything that has zero marginal costs of production obviously has scale economies, and things that have zero marginal costs of reproduction very often tend to have network effects, because it doesn't cost you anything more to stamp out the thing. So then you can just create little hooks for users to add value to each other.

You should always be thinking about how your users, your customers, can add value to each other because that is the ultimate form of leverage. You're at the beach in the Bahamas or you're sleeping at night and your customers are adding value to each other.

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PRODUCT LEVERAGE IS EGALITARIAN

Naval: Labor and capital are much less egalitarian, not just in the inputs, but in their outputs.

Let's say that I need something that humans have to provide like if I want a massage or if I need someone to cook my food. The more of a human element there is in providing that service, the less egalitarian it is. Jeff Bezos probably has much better vacations than most of us because he has lots of humans running around doing whatever he needs to do.

If you look at the output of code and media, Jeff Bezos doesn't get to watch better movies and TV than we do. Jeff Bezos doesn't get to even have better computing experience. Google doesn't give him some premium, special Google account where his searches are better.

It's the nature of code and media output that the same product is accessible to everybody. It turns into a positive sum game where if Jeff Bezos is consuming the same product as a thousand other people, that product is going to be better than the version that Jeff would consume on his own.

Status goods are limited to a few people

Whereas with other products, that's not true. If you look at something like buying a Rolex, which is no longer about telling time. It's a signaling good. It's all about showing off, "I have a Rolex." That's a zero sum game.

If everybody in the world is wearing a Rolex, then people don't want to wear Rolexes anymore because they no longer signal. It's canceled out the effect.

Rich people do have an advantage in consuming that product. They'll just price it up until only they can have Rolexes. Then poor people can't have Rolexes and Rolexes resume their signaling value.

The best products tend to be targeted at the middle class

Something like watching Netflix or using Google or using Facebook or YouTube or even frankly modern day cars. Rich people don't have better cars. They just have weirder cars.

You can't drive a Lamborghini on the street at any speed that makes sense for a Lamborghini, so it's actually a worse car in the street. It just turned into a signaling good at that point. Your sweet spot, where you want to be, is somewhere like a Tesla Model 3 or like a Toyota Corolla which is an amazing car.

A new Toyota Corolla is a really nice car, but because it's mainstream, the technology has amortized the cost of production over the largest number of consumers possible.

The best products tend to be at the center, at the sweet spot, the middle class, rather than being targeted at the upper class.

Creating wealth with product leads to more ethical wealth

I think one of the things that we don't necessarily appreciate in modern societies is as the forms of leverage have gone from being human-based, labor-based and being capital-based to being more product and code and media-based, that most of the goods and services that we consume are becoming much more egalitarian in their consumption.

Even food is becoming that way. Food is becoming cheap and abundant, at least in the first world, too much so to our detriment. Jeff Bezos isn't necessarily eating better food. He's just eating different food or he's eating food that's prepared and served theatrically, so it's almost like more of again the human element of performance.

But the labor element out of food production has gone down massively. The capital element has gone down massively. Even food production itself has become more technology-oriented, and so the gap between the haves and the have-nots is getting smaller.

If you care about ethics in wealth creation, it is better to create your wealth using code and media as leverage because then those products are equally available to everybody as opposed to trying to create your wealth through labor or capital.

You want to use the product that is used by the most people

What I'm referring to here is scale economies. Technology products and media products have such amazing scale economies that you always want to use the product that is used by the most people. The one that's used by the most people ends up having the largest budget. There's no marginal cost of adding another user, and so with the largest budget, you get the highest quality.

The best TV shows are actually not going to be some obscure ones just made for a few rich people. They're going to be the big budget ones, like the Game of Thrones or the Breaking Bad or Bird Box, where they have massive, massive budgets. They can just use those budgets to get to a certain quality level.

Then rich people, to be different, they have to fly to Sundance and watch a documentary. You and I aren't going to fly to Sundance because that's something that bored rich people do to show off. We're not going to watch a documentary because most of them just aren't actually even that good.

Again, if you're wealthy today, for large classes of things, you spend your money on signaling goods to show other people that you're wealthy, then you try and convert them to status. As opposed to actually consuming the goods for their own sake.

Nivi: People and capital as a form of leverage have a negative externality and code and product have a positive externality attached to them, if I was going to sum up your point.

Capital and labor are becoming permissionless

I think that capital and labor are also starting to become a little more permissionless or at least the permissioning is diffuse because of the Internet. Instead of labor, we have community now, which is a diffused form of labor. For example, Mark Zuckerberg has a billion people doing work for him by using Facebook.

Instead of going to raise capital from someone who's rich, now we have crowdfunding. You can raise millions and millions of dollars for a charity, for a health problem or for a business. You can do it all online.

Capital and labor are also becoming permissionless, and you don't need to necessarily do it the old fashioned way, where you have to go around and ask people for permission to use their money or their time.

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PRODUCT AND MEDIA ARE NEW LEVERAGE

Naval: The most interesting and the most important form of leverage is this idea of products that have no marginal cost of replication. This is the new form of leverage.

This was only invented in the last few hundred years. It got started with the printing press. It accelerated with broadcast media, and now it's really blown up with the Internet and with coding.

Now, you can multiply your efforts without having to involve other humans and without needing money from other humans.

This podcast is a form of leverage. Long ago, I would have had to sit in a lecture hall and lecture each of you personally. I would have maybe reached a few hundred people and that would have been that.

Then 40 years ago, 30 years ago, I would have to be lucky to get on TV, which is somebody else's leverage. They would have distorted the message. They would have taken the economics out of it or charged me for it. They would have muddled the message, and I would have been lucky to get that form of leverage.

Today, thanks to the Internet, I can buy a cheap microphone, hook it up to a laptop or an iPad, and there you are all listening.

Product leverage is where the new fortunes are made

This newest form of leverage is where all the new fortunes are made, all the new billionaires. The last generation, fortunes were made by capital. That was the Warren Buffets of the world.

But the new generation's fortunes are all made through code or media. Joe Rogan making 50 to a 100 million bucks a year from his podcast. You're going to have a PewDiePie. I don't know how much money he's rolling in, but he's bigger than the news. The Fortnite players. Of course Jeff Bezos and Mark Zuckerberg and Larry Page and Sergey Brin and Bill Gates and Steve Jobs. That is all code-based leverage.

Combining all three forms of leverage is a magic combination

Now, the beauty is when you combine all of these three. That's where tech startups really excel, where you take just the minimum, but highest output labor that you can get, which are engineers, and designers, product developers. Then you add in capital. You use that for marketing, advertising, scaling. You add in lots of code and media and podcasts and content to get it all out there.

That is a magic combination, and that's why you see technology startups explode out of nowhere, use massive leverage and just make huge outside returns.

Product and media leverage are permissionless

Nivi: Do you want to talk a little bit about permissioned versus permissionless?

Naval: Probably the most interesting thing to keep in mind about the new forms of leverage is they are permissionless. They don't require somebody else's permission for you to use them or succeed.

For labor leverage, somebody has to decide to follow you. For capital leverage, somebody has to give you money to invest or to turn into a product.

Coding, writing books, recording podcasts, tweeting, YouTubing, these kinds of things, these are permissionless. You don't need anyone's permission to do them, and that's why they are very egalitarian. They're great equalizers of leverage.

As much as people may rail on Facebook and YouTube, they're not going to stop using it because this permissionless leverage, where everyone can be a broadcaster, is just too good.

The same way you can rail upon Apple for having a slightly closed ecosystem in the iPhone, but everyone's writing apps for it. As long as you can write apps for it, you can get rich or reach users doing that, why not?

The robot army is already here—code lets you tell them what to do

I think of all the forms of leverage, the best one in modern society ... This is glib. This is a little overused. This is why I tell people learn to code. It's that we have this idea that in the future there's going to be these robots and they're going to be doing everything.

That may be true, but I would say that the majority of the robot revolution has already happened. The robots are already here and there are way more robots than there are humans, it's just that we pack them in data centers for heat and efficiency reasons. We put them in servers. They're inside the computers. All the circuits, it's robot minds inside that's doing all the work.

Every great software developer, for example, now has an army of robots working for him at nighttime, while he or she sleeps, after they've written the code and it's just cranking away.

The robot army is already here. The robot revolution has already happened. We're about halfway through it. We're just adding in much more of the hardware component these days as we get more comfortable

with the idea of autonomous vehicles and autonomous airplanes and autonomous ships and maybe autonomous trucks. There're delivery bots and Boston Dynamics robots and all that.

But robots who are doing web searching for you, for example, are already here. The ones who are cleaning up your video and audio and transmitting it around the world are already here. The ones who are answering many customer service queries, things that you would have had to call a human for are already here.

An army of robots is already here. It's very cheaply available. The bottleneck is just figuring out intelligent and interesting things to do to them.

Essentially you can order this army of robots around. The commands have to be issued in a computer language, in a language that they understand.

These robots aren't very smart. They have to be told very precisely what to do and how to do it. Coding is such a great superpower because now you can speak the language of the robot armies and you can tell them what to do.

Nivi: I think at this point, people are not only commanding the army of robots within servers through code, they're actually manipulating the movement of trucks, of other people. Just ordering a package on Amazon, you're manipulating the movement of many people and many robots to get a package delivered to you.

People are doing the same things to build businesses now. There's the army of robots within servers and then there's also an army of actual robots and people that are being manipulated through software.

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LABOR AND CAPITAL ARE OLD LEVERAGE

Nivi: Why don't we talk a little bit about leverage?

The first tweet in the storm was a famous quote from Archimedes, which was, "Give me a lever long enough and a place to stand and I will move the Earth."

The next tweet was, "Fortunes require leverage. Business leverage comes from capital, people and products with no marginal costs of replication."

Naval: Leverage is critical. The reason I stuck in Archimedes quote in there is... normally I don't like putting other people's quotes in my Twitter. That doesn't add any value. You can go look up those people's quotes. But this quote I had to put in there because it's just so fundamental. I read it when I was very, very young and it had a huge impression on me.

We all know what leverage is when we use a seesaw or a lever. We understand how that works physically, but I think what our brains aren't really well-evolved to comprehend is how much leverage is possible in modern society and what the newest forms of leverage are.

Society overvalues labor leverage

The oldest form of leverage is labor, which is people working for you. Instead of me lifting rocks, I can have 10 people lift rocks. Then just by my guidance on where the rock should go, a lot more rocks get moved than I could do myself. Everybody understands this because we're evolved to understand the labor form of leverage, so what happens is society overvalues labor as a form of leverage.

This is why your parents are impressed when you get a promotion and you have lots of people working underneath you. This is why when a lot of naive people, when you tell them about your company, they'll say, "How many people work there?" They'll use that as a way to establish credibility. They're trying to measure how much leverage and impact you actually have.

Or when someone starts a movement, they'll say how many people they have or how big the army is. We just automatically assume that more people is better.

You want the minimum amount of labor that allows you to use the other forms of leverage

I would argue that this is the worst form of leverage that you could possibly use. Managing other people is incredibly messy. It requires tremendous leadership skills. You're one short hop from a mutiny or getting eaten or torn apart by the mob.

It's incredibly competed over. Entire civilizations have been destroyed over this fight. For example, communism, Marxism, is all about the battle between capital and labor, das kapital and das labor. It's kind of a trap.

You really want to stay out of labor-based leverage. You want the minimum amount of people working with you that are going to allow you to use the other forms of leverage, which I would argue are much more interesting.

Capital has been the dominant form of leverage in the last century

The second type of leverage is capital. This one's a little less hardwired into us because large amounts of money moving around and being saved and being invested in money markets, these are inventions of human beings the in last few hundred to few thousand years. They're not evolved with us from hundreds of thousands of years.

We understand them a little bit less well. They probably require more intelligence to use correctly, and the ways in which we use them keep changing. Management skills from a hundred years ago might still apply today, but investing in the stock market skills from a hundred years ago probably don't apply to the same level today.

Capital is a trickier form of leverage to use. It's more modern. It's the one that people have used to get fabulously wealthy in the last century. It's probably been the dominant form of leverage in the last century.

You can see this by who are the richest people. It's bankers, politicians in corrupt countries who print money, essentially people who move large amounts of money around.

If you look at the top of very large companies, outside of technology companies, in many, many large old companies, the CEO job is really a financial job. They're really financial asset managers. Sometimes, an asset manager can put a pleasant face on it, so you get a Warren Buffet type.

But deep down, I think we all dislike capital as a form of leverage because it feels unfair. It's this invisible thing that can be accumulated and passed across generations and suddenly seems to result in people having gargantuan amounts of money with nobody else around them or necessarily sharing in it.

That said, capital is a powerful form of leverage. It can be converted to labor. It can be converted to other things. It's very surgical, very analytical.

If you are a brilliant investor and give \$1 billion and you can make a 30% return with it, whereas anybody else can only make a 20% return, you're going to get all the money and you're going to get paid very handsomely for it.

It scales very, very well. If you get good at managing capital, you can manage more and more capital much more easily than you can manage more and more people.

You need specific knowledge and accountability to obtain capital

It is a good form of leverage, but the hard part with capital is how do you obtain it? That's why I talked about specific knowledge and accountability first.

If you have specific knowledge in a domain and if you're accountable and you have a good name in that domain, then people are going to give you capital as a form of leverage that you can use to then go get more capital.

Capital also is fairly well understood. I think a lot of the knocks against capitalism come because of the accumulation of capital.

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TAKE ACCOUNTABILITY TO EARN EQUITY

Naval: Accountability is important because that's how you're going to get leverage. That's how you're going to get credibility. It's also how you're going to get equity. You're going to get a piece of the business.

When you're negotiating with other people, ultimately if someone else is making a decision about how to compensate you, that decision will be based on how replaceable you are. If you have high accountability, that makes you less replaceable. Then they have to give you equity, which is a piece of the upside.

Taking accountability is like taking equity in all your work

Equity itself is a good example because equity is also a risk-based instrument. Equity means you get paid everything after all the people who need guaranteed money are paid back.

If you look at the hierarchy of capital in a company, the employees get paid first. They get paid the salary first. In legal [bankruptcy] proceedings, the salaries are sacrosanct. If you're a board member and the company spends too much money and has back salaries to pay, the government can go after you personally to pay back the salaries. The employees get the most security, but in exchange for that security, they don't have as much upside.

Next in line would be the debt holders who are maybe the bankers who lend money to the company for operations and they need to make their fixed coupon every month or every year, but they don't get much more upside beyond that. They might be making 5, 10, 15, 20, 25% a year, but that's what their upside is limited to.

Finally there are the equity holders. These people are actually going to get most of the upside. Once the debt holders are paid off and the salaries are paid off, whatever remains goes to them.

But if there isn't enough money to pay off the salaries and the debt holders, or if there's just barely enough to pay off the salary and the debt holders, which is what happens with most businesses, most of the times, the equity holders get nothing.

The equity holders take on greater risk, but in exchange, they get nearly unlimited upside. You can do the same with all of your work. Essentially, taking accountability for your actions is the same as taking an equity position in all of your work. You're taking greater downside risk for greater upside.

Realize that in modern society, the downside risk is not that large. Even personal bankruptcy can wipe the debts clean in good ecosystems. I'm most familiar with Silicon Valley, but generally people will forgive failures as long as you were honest and made a high integrity effort.

There's not really that much to fear in terms of failure, and so people should be taking on a lot more accountability than they actually are.

Nivi: Is accountability actually fragile or do you really just mean that we're hardwired not to fail in public, so it just feels like it's a fragile thing?

Naval: I think it could actually be fragile. An example of accountability is you're an airplane pilot. As a captain, you're taking on accountability for the entire plane.

Let's say that something goes wrong with the aircraft. You can't later blame it on anyone else. You can't blame it on the steward or the stewardess. You can't blame it on the copilot. You're the captain. You're responsible for the ship. If you screw up, you crash the ship, and there are immediate consequences.

In the old days, the captain was expected to go down with the ship. If the ship was sinking, then literally the last person who got to get off was the captain. I think accountability does come with real risks, but we're talking about a business context.

The risk here would be that you would probably be the last one to get your capital back out. You'd be the last one to get paid for your time. The time that you've put in, the capital that you've put into the company, these are what are at risk.

Even if a business fails and your name's on it, that's not as bad as if it turns out to be an integrity issue. Bernie Madoff, for example, Madoff investments, that name is never going to be good again in the investment community. You could be Bernie Madoff's great-great-great-grandson. You are not going to go into the investment business because he ruined the family name.

I think these days the accountability risk with a name happens more around integrity, rather than it does around purely economic failure.

Accountability is reputational skin in the game

Nivi: The big takeaway for me on accountability is that you will be rewarded directly in proportion with your accountability. I also think this is why people like Taleb rail against CEOs who get rewards without accountability.

Naval: Yeah. Taleb's Skin In The Game is required reading. If you want to get anywhere in modern life and understand how modern systems work, then Skin In The Game would be near the top of my list to read.

Accountability, skin in the game, these concepts go very closely hand in hand. I think of accountability as reputational skin in the game. It's putting your personal reputation on the line as skin in the game.

Accountability is a simple concept. The only part of accountability that may be a little counterintuitive is that we're currently socially brainwashed to not take on accountability, not in a visible way.

I think there are ways to take on accountability where every member of a team can take on accountability for their portion. That is how you get a well-functioning team while still putting credits and losses in the correct columns.

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EMBRACE ACCOUNTABILITY TO GET LEVERAGE

Nivi: Why don't we jump into accountability, which I thought was pretty interesting and I think you have your own unique take on it. So the first tweet on accountability was, "Embrace accountability and take business risks under your own name. Society will reward you with responsibility, equity, and leverage."

Naval: Yeah. So to get rich, you're going to need leverage. Leverage comes in labor, comes in capital, or it can come through code or media. But most of these, like labor and capital, people have to give to you. For labor, somebody has to follow you. For capital, somebody has to give you money or assets to manage or machines.

So to get these things, you have to build up credibility and you have to do those under your own name as much as possible, which is risky. So accountability is a double-edged thing. It allows you to take credit when things go well and to bear the brunt of the failure when things go badly.

Take business risks under your own name

So in that sense, people who are stamping their names on things aren't foolish. They're just confident. Maybe it turns out to be foolish in the end, but if you look at a Kanye or an Oprah or a Trump or an Elon or anyone like that, these people can get rich just off their name because their name is such powerful branding.

Regardless of what you think of Trump, you have to realize that the guy was among the best in the world at just branding his name. Why would you go to Trump Casino? Used to be because Trump. Why would you go to a Trump tower? Because of Trump.

When it came time to vote, I think that a lot of voters just went in and said, "Trump." They recognize the name, so the name recognition paid off.

Same thing with Oprah. She puts her brand on something, her name on something and it flies off the shelves, and it's like an instant validator.

These people also take risks for putting their name out there. Obviously Trump is now probably hated by half or more than half of the country and by a big chunk of the world as he sticks his name out there.

By putting your name out there, you become a celebrity, and fame has many, many downsides. It's better to be anonymous and rich than to be poor and famous, but even famous and rich has a lot of downsides associated with it. You're always in the public eye.

A well-functioning team has clear accountability for each position

Accountability is quite important, and when you're working to build a product or you're working in a team or you're working in a business, we constantly have drummed into our heads how important it is to be part of a team. Absolutely agree with that.

A lot of our training socially is telling us to not stick our necks out of the crowd. There's a saying that I hear from our Australian friends that the tall poppy gets cut. Don't stick your neck out, but I would say that actually a really, really well-functioning team is small and has clear accountability for each of the different portions.

You can say, "Okay, this person's responsible for building the product. This person's responsible for the messaging. This person's responsible for raising money. This person's responsible for the pricing strategy and maybe the online advertising." So if somebody screws up, you know exactly who's responsible. While at the same time if something goes really well, you also know exactly who's responsible.

If you have a small team and you have clearly delineated responsibilities, then you can still keep a very high level of accountability. Accountability is really important because when something succeeds or fails, if it fails, everybody points fingers at each other, and if it succeeds, everybody steps forward to take credit.

We've all had that experience when we were in school and we got a group assignment to do. There were probably a few people in there who did a lot of the work. Then there are a few people who just did a lot of grandstanding or positioning to do the work. We're all familiar with this from a childhood sense, but it's sort of uncomfortable to talk about.

People who can fail in public have a lot of power

Clear accountability is important. Without accountability, you don't have incentives. Without accountability, you can't build credibility. But you take risk. You take risk of failure. You take risk of humiliation. You take risk of failure under your own name.

Luckily in modern society, there's no more debtors' prison and people don't go to jail or get executed for losing other people's money, but we're still socially hard wired to not fail in public under our own names. The people who have the ability to fail in public under their own names actually gain a lot of power .

For example, I'll give a personal anecdote. Up until about 2013, 2014, my public persona was an entirely around startups and investing. Only around 2014, 2015 did I start talking about philosophy and psychological things and broader things.

It made me a little nervous because I was doing it under my own name. There were definitely people in the industry who sent me messages through the back channel like, "What are you doing? You're ending your career. This is stupid."

I kind of just went with it. I took a risk. Same with crypto. Early on, I took a risk.

But when you put your name out there, you take a risk with certain things. You also get to reap the rewards. You get the benefits.

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THERE'S NO ACTUAL SKILL CALLED "BUSINESS"

Naval: In that sense, business to me is bottom of the barrel. There's no actual skill called business, it's too generic. It's like a skill called "relating." Like "relating to humans." That's not a skill, it's too broad.

A lot of what goes on in business schools, and there is some very intelligent stuff taught in business schools – I don't mean to detract from them completely – some of the things taught in business school are just anecdotes. They call them "case studies."

But they're just anecdotes, and they're trying to help you pattern match by throwing lots of data points at you, but the reality is, you will never understand them fully until you're actually in that position yourself.

Even then you will find that basic concepts from game theory, psychology, ethics, mathematics, computers, and logic will serve you much, much better.

I would focus on the foundations, I would focus with a science bent. I would develop a love for reading, including by reading so-called junk food that you're not supposed to read. You don't have to read the classics. That [reading] is the foundation for your self-education.

Doing is faster than watching

Nivi: What did you mean when you said that "doing is faster than watching?"

Naval: When it comes to your learning curve, if you want to optimize your learning curve... One of the reasons why I don't love podcasts, even though I'm a generator of podcasts, is that I like to consume my information very quickly.

And I'm a good reader, or a fast reader and I can read very fast but I can only listen at a certain speed. I know people listen at 2x, 3x, but everyone sounds like a chipmunk and it's hard to go back, it's hard to highlight, it's hard to pinpoint snippets and save them in your notebook, and so on.

Similarly, a lot of people think they can become really skilled at something by watching others do it, or even by reading about others doing it. And going back to the business school case study, that's a classic example.

They study other people's businesses, but in reality, you're going to learn a lot more about running a business by operating your own lemonade stand or equivalent. Or even opening a little retail store down the street.

That is how you're going to learn on the job because a lot of the subtleties don't express themselves until you're actually in the business.

For example, everyone's into mental models these days. You go to Farnam Street, you go to Poor Charlie's Almanack, and you can learn all the different mental models. But which ones matter more? Which ones do you apply more often? Which ones matter in which circumstances? That's actually the hard part.

For example, my personal learning has been that the principal-agent problem drives so much in this world. It's an incentives problem. I've learned that tit-for-tat iterated prisoner's dilemma is the piece of game theory that is worth knowing the most. You can almost put down the game theory book after that.

By the way, the best way to learn game theory is to play lots of games. I never even read game theory books. I consider myself extremely good at game theory. I've never opened up a game theory book and found a result in there where I didn't think, "Oh, yeah, that's common sense to me."

The reason is that I grew up playing all kinds of games and I ran into all kinds of corner cases with all kinds of friends, and so it's just second nature to me. You can always learn better by doing it on the job.

The number of "doing" iterations drives the learning curve

But doing is a subtle thing. Doing encapsulates a lot. For example, let's say, I want to learn how to run a business. Well, if I start a business where I go in every day and I'm doing the same thing, let's say I'm running a retail store down the street where I'm stocking the shelves with food and liquor every single day, I'm not going to learn that much because I'm repeating things a lot.

So, I'm putting in thousands of hours, but they are thousands of hours doing the same thing. Whereas if I was putting in thousands of iterations, that would be different. So, the learning curve is across iterations [not iterations].

So if I was trying new marketing experiments in the store all the time, I was constantly changing up the inventory, I was constantly changing up the branding and the messaging, I was constantly changing the sign, I was constantly changing the online channels that are used to drive foot traffic in, I was experimenting with being open at different hours, I had the ability to walk around and talk to other store owners and getting their books and figure out how they run their businesses.

It's the number of iterations that drives the learning curve. So, the more iterations you can have, the more shots on goal you can have, the faster you're going to learn. It's not just about the hours put in.

If you're willing to bleed a little every day, you may win big later

It's actually a combination of the two, but I think just the way we're built and the way that the world presents itself, the world offers us very easily the opportunity to do the same thing over and over and over again. But really, we'd be better served if we went off and found ways to do new things from scratch.

And doing something new the first time is painful, because you're wandering into uncertain territory and high odds are that you will fail. So you just have to get very, very comfortable with frequent small failures.

Nassim Taleb talks about this also. He made his fortune, his wealth by being a trader who basically relied upon black swans. Nassim Taleb made money by losing little bits of money every day and then once in a blue moon he would make a lot of money when the unthinkable happened for other people.

Whereas most people want to make little bits of money every day and in exchange they'll tolerate lots of blow-up risk, they'll tolerate going completely bankrupt.

We're not evolved to bleed a little bit every day. If you're out in the natural environment, and you get a cut and you're literally bleeding a little bit every day, you will eventually die. You'll have to stop that cut.

We're evolved for small victories all the time but that becomes very expensive. That's where the crowd is. That's where the herd is. So, if you're willing to bleed a little bit every day but in exchange you'll win big later, you will do better.

That is, by the way, entrepreneurship. Entrepreneurs bleed every day.

They're not making money, they're losing money, they're constantly stressed out, all the responsibility is upon them, but when they win they win big. On average they'll make more.

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THE FOUNDATIONS ARE MATH AND LOGIC

Naval: Foundational things are principles, they're algorithms, they're deep seated logical understanding where you can defend it or attack it from any angle. And that's why microeconomics is important because macroeconomics is a lot of memorization, a lot of macro bullshit.

As Nassim Taleb says, it is easier to macro bullshit than it is the micro bullshit. Because macroeconomics is voodoo-complex-science meets politics. You can't find two macroeconomists to agree on anything these days, and different macroeconomists get used by different politicians to peddle their different pet theories.

There are even macroeconomists out there now peddling something called Modern Monetary Theory which basically says, hey, except for this pesky thing called inflation, we can just print all the money that we want. Yes, except for this pesky thing called inflation. That's like saying, except for limited energy, we can fire rockets off into space all day long.

It's just nonsense, but the fact that there are people who have "macroeconomist" in their title and are peddling Modern Monetary Theory just tells you that macroeconomics as a so-called science has been corrupted. It's now a branch of politics.

So, you really want to focus on the foundations. The ultimate foundation are mathematics and logic. If you understand logic and mathematics, then you have the basis for understanding the scientific method. Once you understand the scientific method, then you can understand how to separate truth from falsehood in other fields and other things that you're reading.

It's better to read a great book really slowly than to fly through a hundred books quickly

So, be very careful about reading other people's opinions and even be careful when reading facts because so-called facts are often just opinions with a veneer [of pseudoscience] around them.

What you are really looking for are algorithms. What you are really looking for is understanding. It's better to go through a book really slowly and struggle and stumble and rewind, than it is to fly through it quickly and say, "Well, now I've read 20 books, I've read 30 books, I've read 50 books in the field."

It's like Bruce Lee said, "I don't fear the man who knows a thousand kicks and a thousand punches, I fear the man who's practiced one punch ten thousand times or one kick ten thousand times." It's that understanding that comes through repetition and through usage and through logic and foundations that really makes you a smart thinker.

Learn persuasion and programming

Nivi: To lay a foundation for learning for the rest of your life I think you need two things, if I was going to try and sum it up. One, practical persuasion and two, you need to go deep in some technical category, whether it's abstract math, or you want to read Donald Knuth's books on algorithms, or you want to read Feynman's lectures on physics.

If you have practical persuasion and a deep understanding of some complex topic, I think you'll have a great foundation for learning for the rest of your life.

Naval: Yeah. In fact let me expand that a little bit. I would say that the five most important skills are of course, reading, writing, arithmetic, and then as you're adding in, persuasion, which is talking. And then finally, I would add computer programming just because it's an applied form of arithmetic that just gets you so much leverage for free in any domain that you operate in.

If you're good with computers, if you're good at basic mathematics, if you're good at writing, if you're good at speaking, and if you like reading, you're set for life.

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READ WHAT YOU LOVE UNTIL YOU LOVE TO READ

Nivi: Before we go and talk about accountability and leverage and judgment, you've got a few tweets further down the line that I would put in the category of continuous learning.

They're essentially, "there is no skill called business. Avoid business magazines and business class, study microeconomics, game theory, psychology, persuasion, ethics, mathematics and computers."

There's one other comment that you made in a Periscope that was, "you should be able to pick up any book in the library and read it." And the last tweet in this category was, "reading is faster than listening, doing is faster than watching."

Naval: Yeah, the most important tweet on this, I don't even have in here unfortunately, which is, the foundation of learning is reading. I don't know a smart person who doesn't read and read all the time.

And the problem is, what do I read? How do I read? Because for most people it's a struggle, it's a chore. So, the most important thing is just to learn how to educate yourself and the way to educate yourself is to develop a love for reading.

So, the tweet that is left out, the one that I was hinting at is, "read what you love until you love to read." It's that simple.

Everybody I know who reads a lot loves to read, and they love to read because they read books that they loved. It's a little bit of a catch-22, but you basically want to start off just reading wherever you are and then keep building up from there until reading becomes a habit. And then eventually, you will just get bored of the simple stuff.

So you may start off reading fiction, then you might graduate to science fiction, then you may graduate to non-fiction, then you may graduate to science, or philosophy, or mathematics or whatever it is, but take your natural path and just read the things that interest you until you kind of understand them. And then you'll naturally move to the next thing and the next thing and the next thing.

Read the original scientific books in a field

Now, there is an exception to this, which is where I was hinting with what things you actually do want to learn, which is, at some point there's too much out there to read. Even reading is full of junk.

There are actually things you can read, especially early on, that will program your brain a certain way, and then later things that you read, you will decide whether those things are true or false based on the earlier things.

So, it is important that you read foundational things. And foundational things, I would say, are the original books in a given field that are very scientific in their nature.

For example, instead of reading a business book, pick up Adam Smith's *The Wealth of Nations*. Instead of reading a book on biology or evolution that's written today, I would pick up Darwin's *Origin of the*

Species. Instead of reading a book on biotech right now that may be very advanced, I would just pick up The Eighth Day of Creation by Watson and Crick. Instead of reading advanced books on what cosmology and what Neil Degraesse Tyson and Stephen Hawking have been saying, you can pick up Richard Feynman's Six Easy Pieces and start with basic physics.

Don't fear any book

If you understand the basics, especially in mathematics and physics and sciences, then you will not be afraid of any book. All of us have that memory of when we were sitting in class and we're learning mathematics, and it was all logical and all made sense until at one point the class moved too fast and we fell behind.

Then after that we were left memorizing equations, memorizing concepts without being able to derive them from first principles. And at that moment, we're lost, because unless you're a professional mathematician, you're not going to remember those things. All you're going to remember are the techniques, the foundations.

So, you have to make sure that you're building on a steel frame of understanding because you're putting together a foundation for skyscraper, and you're not just memorizing things because you're just memorizing things you're lost. So the foundations are ultra important.

And the ultimate, the ultimate is when you walk into a library and you look at it up and down and you don't fear any book. You know that you can take any book off the shelf, you can read it, you can understand it, you can absorb what is true, you can reject what is false, and you have a basis for even working that out that is logical and scientific and not purely just based on opinions.

The means of learning are abundant, the desire to learn is scarce

The beauty of the internet is the entire library of Alexandria times 10 is at your fingertips at all times. It's not the means of education or the means of learning are scarce, the means of learning are abundant. It's the desire to learn that's scarce. So, you really have to cultivate the desire.

And it's not even cultivating you've to not lose it. Children have a natural curiosity. If you go to a young child who's first learning language, they're pretty much always asking: What's this? What's that? Why is this? Who's that? They're always asking questions.

But one of the problems is that schools and our educational system, and even our way of raising children replaces curiosity with compliance. And once you replace the curiosity with the compliance, you get an obedient factory worker, but you no longer get a creative thinker. And you need creativity, you need the ability to feed your own brain to learn whatever you want.

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LEARN TO SELL, LEARN TO BUILD

Nivi: Talking about combining skills, you said that you should “learn to sell, learn to build, if you can do both, you will be unstoppable.”

Naval: This is a very broad category. It's two broad categories. One is building the product. Which is hard, and it's multivariate. It can include design, it can include development, it can include manufacturing, logistics, procurement, it can even be designing and operating a service. It has many, many definitions.

But in every industry, there is a definition of the builder. In our tech industry it's the CTO, it's the programmer, it's the software engineer, hardware engineer. But even in the laundry business, it could be the person who's building the laundry service, who is making the trains run on time, who's making sure all the clothes end up in the right place at the right time, and so on.

The other side of it is sales. Again, selling has a very broad definition. Selling doesn't necessarily just mean selling individual customers, but it can mean marketing, it can mean communicating, it can mean recruiting, it can mean raising money, it can mean inspiring people, it could mean doing PR. It's a broad umbrella category.

The Silicon Valley model is a builder and seller

So, generally, the Silicon Valley startup model tends to work best. It's not the only way, but it is probably the most common way, when you have two founders, one of whom is world class at selling, and one of whom is world class at building.

Examples are, of course, Steve Jobs and Steve Wozniak with Apple, Gates and Allen probably had similar responsibilities early on with Microsoft, Larry and Sergey probably broke down along those lines, although it's a little different there because that was a very technical product delivered to end users through a simple interface.

But generally, you will see this pattern repeated over and over. There's a builder and there's a seller. There's a CEO and CTO combo. And venture and technology investors are almost trained to look for this combo whenever possible. It's the magic combination.

If you can do both you will be unstoppable

The ultimate is when one individual can do both. That's when you get true superpowers. That's when you get people who can create entire industries.

The living example is Elon Musk. He may not necessarily be building the rockets himself, but he understands enough that he actually makes technical contributions. He understands the technology well enough that no one's going to snow him on it, and he's not running around making claims that he doesn't think he can't eventually deliver. He may be optimistic on the timelines but he thinks this is within reasonableness for delivery.

Even Steve Jobs developed enough product skills and was involved enough in the product that he also operated in both of these domains. Larry Ellison started as a programmer and I think wrote the first version of Oracle, or was actually heavily involved in it.

Marc Andreessen was also in this domain. He may not have had enough confidence in his sales skills, but he was the programmer who wrote Netscape Navigator, or a big chunk of it. So, I think the real giants in any field are the people who can both build and sell.

I'd rather teach an engineer marketing than a marketer engineering

And usually the building is a thing that a sales person can't pick up later in life. It requires too much focused time. But a builder can pick up selling a little bit later, especially if they were already innately wired to be a good communicator. Bill Gates famously paraphrases this as, "I'd rather teach an engineer marketing, than a marketer engineering."

I think if you start out with a building mentality and you have building skills and it's still early enough in your life, or you have enough focused time that you think you can learn selling, and you have some natural characteristics or you're a good salesperson, then you can double down on those.

Now, your sales skills could be in a different than traditional domain. For example, let's say you're a really good engineer and then people are saying, well, now you need to be good at sales, well, you may not be good at hand-to-hand sales, but you may be a really good writer.

And writing is a skill that can be learned much more easily than, say, in-person selling, and so you may just cultivate writing skills until you become a good online communicator and then use that for your sales.

On the other hand, it could just be that you're a good builder and you're bad at writing and you don't like communicating to mass audiences but you're good one-on-one, so then you might use your sales skills for recruiting or for fundraising, which are more one-on-one kinds of endeavors.

This is pointing out that if you're at the intersection of these two, don't despair because you're not going to be the best technologist and you're not going to be the best salesperson, but in a weird way, that combination, back to the Scott Adams skill stack, that combination of two skills is unstoppable.

Long term, people who understand the underlying product and how to build it and can sell it, these are catnip to investors, these people can break down walls if they have enough energy, and they can get almost anything done.

Nivi: If you could only pick one to be good at, which one would you pick?

Naval: When you're trying to stand out from the noise building is actually better because there're so many hustlers and sales people who have nothing to back them up. When you're starting out, when you're trying to be recognized, building is better.

But much later down the line building gets exhausting because it is a focus job and it's hard to stay current because there's always new people, new products coming up who have newer tools, and frankly more time because it's very intense, it's a very focused task.

So, sales skills actually scale better over time. Like for example, if you have a reputation for building a great product, that's good, but when you ship your new product, I'm going to validate it based on the product. But if you have a reputation for being a good person to do business with and you're persuasive and communicative then that reputation almost becomes self-fulfilling.

So, I think if you only had to pick up one, you can start with building and then transition to selling. This is a cop-out answer, but I think that is actually the right answer.

SPECIFIC KNOWLEDGE IS HIGHLY CREATIVE OR TECHNICAL

Naval: To the extent that specific knowledge is taught, it's on the job. It's through apprenticeships. And that's why the best businesses, the best careers are the apprenticeship or self-taught careers, because those are things society still has not figured out how to train and automate yet.

The classic line here is that Warren Buffett went to Benjamin Graham when he got out of school. Benjamin Graham was the author of the Intelligent Investor and sort of modernized or created value investing as a discipline. And Warren Buffett went to Benjamin Graham and offered to work for him for free.

And Graham said, "Actually, you're overpriced, free is overpriced." And Graham was absolutely right. When it comes to a very valuable apprenticeship like the type that Graham was going to give Buffet, Buffet should have been paying him a lot of money. That right there tells you that those are skills worth having.

Specific knowledge is often highly creative or technical

Specific knowledge also tends to be technical and creative. It's on the bleeding edge of technology, on the bleeding edge of art, on the bleeding edge of communication.

Even today, for example, there are probably meme lords out there on the Internet who can create incredible memes that will spread the idea to millions of people. Or are very persuasive – Scott Adams is a

good example of this. He is essentially becoming one of the most credible people in the world by making accurate predictions through persuasive arguments and videos.

And that is specific knowledge that he has built up over the years because he got obsessed with hypnosis when he was young, he learned how to communicate through cartooning, he embraced Periscope early, so he's been practicing lots of conversation, he's read all the books on the topic, he's employed it in his everyday life. If you look at his girlfriend, she's this beautiful young Instagram model.

That is an example of someone who has built up a specific knowledge over the course of his career. It's highly creative, it has elements of being technical in it, and it's something that is never going to be automated.

No one's going to take that away from him, because he's also accountable under one brand as Scott Adams, and he's operating with the leverage of media with Periscope and drawing Dilbert cartoons and writing books. He has massive leverage on top of that brand and he can build wealth out of it if he wanted to build additional wealth beyond what he already has.

Specific knowledge is specific to the individual and situation

Nivi: Should we be calling it unique knowledge or does specific knowledge somehow make more sense for it?

Naval: You know, I came up with this framework when I was really young. We're talking decades and decades. It's now probably over 30 years old. So, at the time specific knowledge stuck with me so that is how I think about it.

The reason I didn't try and change it is because every other term that I found for it was overloaded in a different way. At least specific knowledge isn't that used. I can kind of rebrand it.

The problem with unique knowledge is, yeah, maybe it's unique but if I learn it from somebody else it's no longer unique, then we both know it. So, it's not so much that it is unique, it's that it is highly specific to the situation, it's specific to the individual, it's specific to the problem, and it can only be built as part of a larger obsession, interest, and time spent in that domain.

It can't just be read straight out of a single book, nor can it be taught in a single course, nor can it be programmed into a single algorithm.

You can't be too deliberate about assembling specific knowledge

Nivi: Speaking of Scott Adams, he's got a blog post on how to build your career by getting in, say, the top 25 percentile at three or more things. And by doing that, you become the only person in the world who can do those three things in the 25th percentile.

So, instead of trying to be the best at one thing, you just try to be very, very good at three or more things. Is that a way of building specific knowledge?

Naval: I actually think the best way is just to follow your own obsession. And somewhere in the back of your mind, you can realize that, actually, this obsession I like and I'll keep an eye out for the commercial aspects of it.

But I think if you go around trying to build it a little too deliberately, if you become too goal-oriented on the money, then you won't pick the right thing. You won't actually pick the thing that you love to do, so you won't go deep enough into it.

Scott Adams' observation is a good one, predicated on statistics. Let's say there's 10,000 areas that are valuable to the human race today in terms of knowledge to have, and the number one in those 10,000 slots is taken.

Someone else is likely to be the number one in each of those 10,000, unless you happen to be one of the 10,000 most obsessed people in the world that at a given thing.

But when you start combining, well, number 3,728 with top-notch sales skills and really good writing skills and someone who understands accounting and finance really well, when the need for that intersection arrives, you've expanded enough from 10,000 through combinatorics to millions or tens of millions. So, it just becomes much less competitive.

Also, there's diminishing returns. So, it's much easier to be top 5 percentile at three or four things than it is to be literally the number one at something.

Build specific knowledge where you are a natural

I think it's a very pragmatic approach. But I think it's important that one not start assembling things too deliberately because you do want to pick things where you are a natural. Everyone is a natural at something.

We're all familiar with that phrase, a natural. "Oh, this person is a natural at meeting men or women, this person is a natural socialite, this person is a natural programmer, this person is a natural reader." So, whatever you are a natural at, you want to double down on that.

And then there are probably multiple things you're natural at because personalities and humans are very complex. So, we want to be able to take the things that you are natural at and combine them so that you automatically, just through sheer interest and enjoyment, end up top 25% or top 10% or top 5% at a number of things.

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ARM YOURSELF WITH SPECIFIC KNOWLEDGE

Nivi: Do you want to talk a little bit about the skills that you need, in particular specific knowledge, accountability, leverage and judgment. So, the first tweet in this area is “Arm yourself with specific knowledge accountability and leverage.” And I’ll throw in judgment as well. I don’t think you covered that in that particular tweet.

Naval: If you want to make money you have to get paid at scale. And why you, that’s accountability, at scale, that’s leverage, and just you getting paid as opposed to somebody else getting paid , that’s specific knowledge.

So, specific knowledge is probably the hardest thing to get across in this whole tweetstorm, and it’s probably the thing that people get the most confused about.

The thing is that we have this idea that everything can be taught, everything can be taught in school. And it’s not true that everything can be taught. In fact, the most interesting things cannot be taught.

But everything can be learned. And very often that learning either comes from some innate characteristics in your DNA, or it could be through your childhood where you learn soft skills which are

very, very hard to teach later on in life, or it's something that is brand new so nobody else knows how to do it either, or it's true on the job training because you're pattern matching into highly complex environments, basically building judgment in a specific domain.

Classic example is investing, but it could be in anything. It could be in judgment in running a fleet of trucks, it could be judgment in weather forecasting.

So, specific knowledge is the knowledge that you care about. Especially if you're later in life, let's say your post 20, 21, 22, you almost don't get to choose which specific knowledge you have. Rather, you get to look at what you have already built by that point in time, and then you can build on top of it.

Specific knowledge can't be trained

The first thing to notice about specific knowledge is that you can't be trained for it. If you can be trained for it, if you can go to a class and learn specific knowledge, then somebody else can be trained for it too, and then we can mass-produce and mass-train people. Heck, we can even program computers to do it and eventually we can program robots to walk around doing it.

So, if that's the case, then you're extremely replaceable and all we have to pay you is the minimum wage that we have to pay you to get you to do it when there are lots of other takers who can be trained to do it. So really, your returns just devolve into your cost of training plus the return on investment on that training.

So, you really want to pick up specific knowledge, you need your schooling, you need your training to be able to capitalize on the best specific knowledge, but the part of it that you're going to get paid for is the specific knowledge.

Specific knowledge is found by pursuing your curiosity

For example, someone who goes and gets a degree in psychology and then becomes a salesperson. Well if they were already a formidable salesperson, a high grade salesmanship to begin with, then the psychology degree is leverage, it arms them and they do much better at sales.

But if they were always an introvert never very good at sales and they're trying to use psychology to learn sales, they're just not going to get that great at it.

So, specific knowledge is found much more by pursuing your innate talents, your genuine curiosity, and your passion. It's not by going to school for whatever is the hottest job, it's not for going into whatever field investors say is the hottest.

Very often specific knowledge is at the edge of knowledge. It's also stuff that's just being figured out or is really hard to figure out.

So, if you're not 100% into it somebody else who is 100% into it will outperform you. And they won't just outperform you by a little bit, they'll outperform you by a lot because now we're operating the domain of ideas, compound interest really applies and leverage really applies.

So, if you're operating with 1,000 times leverage and somebody is right 80% of the time, and somebody else is right 90% of time, the person who's right 90% of the time will literally get paid hundreds of times more by the market because of the leverage and because of the compounding factors and being correct. So, you really want to make sure you're good at it so that genuine curiosity is very important.

Building specific knowledge will feel like play to you

So, very often, it's not something you sit down and then you reason about, it's more found by observation. You almost have to look back on your own life and see what you're actually good at.

For example, I wanted to be a scientist and that is where a lot of my moral hierarchy comes from. I view scientists sort of at the top of the production chain for humanity. And the group of scientists who have made real breakthroughs and contributions that probably added more to human society, I think, than any single other class of human beings.

Not to take away anything from art or politics or engineering or business, but without the science we'd still be scrambling in the dirt fighting with sticks and trying to start fires.

My whole value system was built around scientists and I wanted to be a great scientist. But when I actually look back at what I was uniquely good at and what I ended up spending my time doing, it was

more around making money, tinkering with technology, and selling people on things. Explaining things, talking to people.

So, I have some sales skills, which is a form specific knowledge that I have. I have some analytical skills around how to make money. And I have this ability to absorb data, obsess about it, and break it down and that is a specific skill that I have. I also just love tinkering with technology. And all of this stuff feels like play to me, but it looks like work to others.

So, there are other people to whom these things would be hard and they say like, “Well, how do I get good at being pithy and selling ideas?” Well, if you’re not already good at it or if you’re not really into it, maybe it’s not your thing, focus on the thing that you are really into.

This is ironic, but the first person to actually point out my real specific knowledge was my mother. She did it as an aside, talking from the kitchen and she said it when I was like 15 or 16 years old. I was telling a friend of mine that I want to be an astrophysicist and she said, “No, you’re going to go into business.”

I was like, “What, my mom’s telling me I’m going to be in business. I’m going to be an astrophysicist. Mom doesn’t know she’s talking about.” But mom knew exactly what she was talking about.

She’d already observed that every time we walk down the street, I would critique the local pizza parlor on why they were selling their slices a certain way with certain toppings and why their process of ordering was this way when it should have been that way.

So, she knew that I had more of a business curious mind, but then my obsession with science combined to create technology and technology businesses where I found myself.

So, very often, your specific knowledge is observed and often observed by other people who know you well and revealed in situations rather than something that you come up with.

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PARTNER WITH RATIONAL OPTIMISTS

Nivi: Let's do this last tweet. You said, "Don't partner with cynics, and pessimists. Their beliefs are self-fulfilling."

Naval: Yes. Essentially, to create things, you have to be a rational optimist. Rational in the sense that you have to see the world for what it really is. And yet you have to be optimistic about your own capabilities, and your capability to get things done.

We all know people who are consistently pessimistic, who will shoot down everything. Everyone in their life has the helpful critical guy, right? He thinks he's being helpful, but he's actually being critical, and he's a downer on everything.

That person will not only never do anything great in their lives, they'll prevent other people around them from doing something great. They think their job is to shoot holes in things. And it's okay to shoot holes in things as long as you come up with a solution.

There's also the classic military line, "Either lead, follow, or get out of the way." And these people want a fourth option, where they don't want to lead, they don't want to follow, but they don't want to get out of the way. They want to tell you why the thing is not going to work.

And all the really successful people I know have a very strong action bias. They just do things. The easiest way to figure out if something is viable or not is by doing it. At least do the first step, and the second step, and the third, and then decide.

So, if you want to be successful in life, creating wealth, or having good relationships, or being fit, or even being happy, you need to have an action bias towards getting what you want.

Partner with rational optimists

And you have to be optimistic about it. Not irrationally. You know, there's nothing worse than someone who is foolhardy and chasing something that's not worth it.

That's why I say rational optimist. But you have to be rational. Know all the pitfalls. Know the downsides, but still keep your chin up.

You've got one life on this planet. Why not try to build something big? This is the beauty of Elon Musk, and why I think he inspires so many people, it's just because he takes on really, really big audacious tasks. And he provides an example for people to think big.

And it takes a lot of work to build even small things. I don't think the corner grocery store owner is working any less hard than Elon Musk, or pouring any less sweat and toil into it. Maybe even more.

But for whatever reason, education, circumstance, they didn't get the chance to think as big, so the outcome is not as big. So, it's just better to think big. Obviously, rationally, within your means, stay optimistic.

The cynics and the pessimists, what they're really saying, it's unfortunate, but they're basically saying, "I've given up. I don't think I can do anything. And so the world to me just looks like a world where nobody can do anything. And so why should you go do something because if you fail, then I'm right, which is great. But if you succeed, then you just make me look bad."

We're descended from pessimists

Nivi: Yes, it's probably better to be an irrational optimist, then it is to be a rational cynic.

Naval: There's a completely rational frame on why you should be an optimist. Historically, if you go back 2,000 years, 5,000 years, 10,000 years, two people are wandering through a jungle, they hear a tiger. One's an optimist, and says, "Oh, it's not headed our way." The other one says, "I'm a pessimist, I'm out of here." And the pessimist runs and survives, and the optimist gets eaten.

So, we're descended from pessimists. We're genetically hardwired to be pessimists. But modern society is far, far safer. There are no tigers wandering around the street. It's very unlikely that you will end up in total ruin, although you should avoid total ruin.

Much more likely that the upside is unlimited, and the downside is limited. So, adapting for modern society means overriding your pessimism, and taking slightly irrationally optimistic bets because the upside is unlimited if you start the next SpaceX, or Tesla, or Uber, you can make billions of dollars of value for society, and for yourself, and change the world.

And if you fail, what's the big deal? You lost a few million dollars of investor money, and they've got plenty more, and that's the bet they take on the chances that you will succeed.

It made sense to be pessimistic in the past. It makes sense to be optimistic today, especially if you're educated and living in a First World country. Even a Third World country. I actually think the economic opportunities in Third World countries are much larger.

The one thing you have to avoid is the risk of ruin. Ruin means stay out of jail. So, don't do anything that's illegal. It's never worth it to wear an orange jumpsuit. And stay out of total catastrophic loss. That could mean that you stay out of things that could be physically dangerous, hurt your body.

You have to watch your health. And stay out of things that can cause you to lose all of your capital, all of your savings. So, don't gamble everything on one go. But take rationally optimistic bets with big upside.

BOCTAOE

Nivi: I think there's people that will try and build up your ideas, and build on your ideas, no matter how far fetched they might seem. And then there are people who list all of the obvious exceptions, no matter how obvious they are.

And fortunately in the startup world, I don't even really get exposed to the people that are giving you the obvious exceptions, and all the reasons it's not going to work. I barely get exposed to that anymore.

Naval: That's what Twitter is for. Scott Adams got so annoyed by this that he came up with a phrase, an acronym, which is "but of course there are obvious exceptions", BOCTAOE. And he used to pin that acronym at the end of his articles for a while.

But Twitter is overrun with nitpickers. Whereas exactly as you were pointing out, Silicon Valley has learned that the upside is so great that you never look down on the kid who's wearing a hoodie and has coffee on his shoes. And just looks like a slob because you don't know if he's going to be the next Mark Zuckerberg, or the next Reid Hoffman.

So, you've got to treat everybody with respect. You've got to look up to every possibility, and opportunity because the upside is so unlimited, and the downside is so limited in the modern world, especially with financial assets and instruments.

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PICK PARTNERS WITH INTELLIGENCE, ENERGY AND INTEGRITY

Naval: In terms of picking people to work with, pick ones that have high intelligence, high energy, and high integrity, I find that's the three-part checklist that you cannot compromise on.

You need someone who is smart, or they'll head in the wrong direction. And you're not going to end up in the right place. You need someone high-energy because the world is full of smart, lazy people.

We all know people in our life who are really smart, but can't get out of bed, or lift a finger. And we also know people who are very high energy, but not that smart. So, they work hard, but they're sort of running in the wrong direction.

And smart is not a pejorative. It's not meant to say someone is smart, someone else is stupid. But it's more that everyone is smart at different things. So, depending on what you want to do well, you have to find someone who is smart at that thing.

And then energy, a lot of times people are unmotivated for a specific thing, but they're motivated for other things. So, for example, someone might be really unmotivated to go to a job, and sit in an office. But they might be really motivated to go paint, right?

Well, in that case they should be a painter. They should be putting art up on the internet. Trying to figure out how to build a career out of that, rather than wearing a collar around their neck, and going to a dreary job.

And then high integrity is the most important because otherwise if you've got the other two, what you have is you have a smart and hard working crook, who's eventually going to cheat you. So, you have to figure out if the person is high-integrity.

And as we talked about, the way you do that is through signals. And signals is what they do, not what they say. It's all the non-verbal stuff that they do when they think nobody is looking.

Motivation has to come intrinsically

Nivi: With respect to the energy, there was this interesting thing from Sam Altman a while back, where he was talking about delegation, and he was saying, "One of the important things for delegation is, delegate to people who are actually good at the thing that you want them to do."

It's the most obvious thing, but it seems like... you want to partner with people who are naturally going to do the things that you want them to do.

Naval: Yeah. I almost won't start a company, or hire a person, or work with somebody if I just don't think they're into what I want them to do.

When I was younger, I used to try and talk people into things. I had this idea that you could sell someone into doing something. But you can't. You can't keep them motivated. You can get them inspired initially. It might work if you're a king like Henry V, and you're trying to get them to just charge into battle, and then they'll figure it out.

But if you're trying to keep someone motivated for the long-term, that motivation has to come intrinsically. You can't just create it, nor can you be the crutch for them if they don't have that intrinsic motivation. So, you have to make sure people actually are high-energy, and want to do what you want them to do, and what you want to work with them on.

Integrity is what someone does, despite what they say they do

Reading signals is very, very important. Signals are what people do despite what they say. So, it's important to pay attention to subtle signals. We all know that socially if someone treats a waiter, or waitress in a restaurant really badly, then it's only a matter of time until they treat you badly.

If somebody screws over an enemy, and is vindictive towards them, well it's only a matter of time before they redefine you from friend to enemy, and you feel their wrath. So, angry, outraged, vindictive, short-term thinking people are essentially that way in many interactions in real life.

People are oddly consistent. That's one of the things you learn about them. So, you want to find long-term people. You want to find people who seem irrationally ethical.

For example, I had a friend of mine whose company I invested in, and the company failed, and he could have wiped out all of the investors. But he kept putting more and more personal money in. Through three different pivots he put personal money in until the company finally succeeded. And in the process, he never wiped out the investors.

And I was always grateful to him for that. I said, "Wow, that's amazing that you were so good to your investors. You didn't wipe them out." And he got offended by that. He said, "I didn't do it for you. I didn't do it for my investors. I did it for me. It's my own self-esteem. It's what I care about. That's how I live my life." That's the kind of person you want to work with.

Another quote that I like, I have a tweet on this. I think I read this somewhere else, so I'm not taking credit for this. But I kind of modified it a little bit. Which is that "self-esteem is the reputation that you have with yourself." You'll always know.

So, good people, moral people, ethical people, easy to work with people, reliable people, tend to have very high self-esteem because they have very good reputations with themselves, and they understand that.

It's not ego. Self-esteem and ego are different things. Because ego can be undeserved, but self-esteem at least you feel like you lived up to your own internal moral code of ethics.

And so it's very hard to work with people who end up being low integrity. And it's hard to figure out who is high integrity and low integrity. Generally, the more someone is saying that they're moral, ethical, and high integrity, the less likely they are to be that way.

It's very much like status signalling. If you overtly bid for status, if you overtly talk about being high status, that is a low status move. If you openly talk about how honest, reliable, and trustworthy you are, you're probably not that honest and trustworthy. That is a characteristic of con men.

So, yeah, pick an industry in which you can play long-term games with long-term people.

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PLAY LONG-TERM GAMES WITH LONG-TERM PEOPLE

Nivi: Talk a little bit about what industries you should think about working in. What kind of job you should have? And who you might want to work with? So, you said, “One should pick an industry where you can play long-term games with long-term people.” Why?

Naval: Yeah, this is an insight into what makes Silicon Valley work, and what makes high trust societies work. Essentially, all the benefits in life come from compound interests. Whether it’s in relationships, or making money, or in learning.

So, compound interest is a marvelous force, where if you start out with 1x what you have, and then if you increase 20% a year for 30 years, it's not that you got 30 years times 20% added on. It was compounding, so it just grew, and grew, and grew until you suddenly got a massive amount of whatever it is. Whether it's goodwill, or love, or relationships, or money. So, I think compound interest is a very important force.

You have to be able to play a long-term game. And long-term games are good not just for compound interest, they're also good for trust. If you look at prisoner's dilemma type games, a solution to prisoner's dilemma is tit-for-tat, which is I'm just going to do to you what you did last time to me, with some forgiveness in case there was a mistake made. But that only works in an iterated prisoner's dilemma, in another words if we play a game multiple times.

So, if you're in a situation, like for example you're in Silicon Valley, where people are doing business with each other, and they know each other, they trust each other. Then they do right by each other because they know this person will be around for the next game.

Now of course that doesn't always work because you can make so much money in one move in Silicon Valley, sometimes people betray each other because they're just like, "I'm going to get rich enough off this that I don't care." So, there can be exceptions to all these circumstances.

But essentially if you want to be successful, you have to work with other people. And you have to figure out who can you trust, and who can you trust over a long, long period of time, that you can just keep playing the game with them, so that compound interest, and high trust will make it easier to play the game, and will let you collect the major rewards, which are usually at the end of the cycle.

So, for example, Warren Buffett has done really well as an investor in the U.S. stock market, but the biggest reason he could do that was because the U.S. stock market has been stable, and around, and didn't get for example seized by the government during a bad administration. Or the U.S. didn't plunge into some war. The underlying platform didn't get destroyed. So, in his case, he was playing a longterm game. And the trust came from the U.S. stock market's stability.

When you switch industries, you're starting over from scratch

In Silicon Valley, the trust comes from the network of people in the small geographic area, that you figure out over time who you can work with, and who you can't.

If you keep switching locations, you keep switching groups... let's say you started out in the woodworking industry, and you built up a network there. And you're working hard, you're trying to build a product in the woodworking industry. And then suddenly another industry comes along that's adjacent but different, but you don't really know anybody in it, and you want to dive in, and make money there.

If you keep hopping from industry to ... "No, actually I need to open a line of electric car stations for electric car refueling." That might make sense. That might be the best opportunity. But every time you reset, every time you wander out of where you built your network, you're going to be starting from scratch. You're not going to know who to trust. They're not going to know to trust you.

There are also industries in which people are transient by definition. They're always coming in and going out. Politics is an example of that, right? In politics new people are being elected. You see in politics that when you have a lot of old-timers, like the Senate, people who have been around for a long time, and they've been career politicians.

There's a lot of downside to career politicians like corruption. But an upside is they actually get deals done with each other because they know the other person is going to be in the same position ten years from now, and they're going to have to keep dealing with them, so they might as well learn how to cooperate.

Whereas every time you get a new incoming freshman class in the House of Representatives, which turns over every two years with a big wave election. Nothing gets done because of a lot of fighting. "Because I just got here, I don't know you, I don't know if you're going to be around, why should I work with you rather than just try to do whatever I think is right?"

So, it's important to pick an industry where you can play long-term games, and with long-term people. So, those people have to signal that they're going to be around for a long time. That they're ethical. And their ethics are visible through their actions.

Long-term players make each other rich

Nivi: In a long-term game, it seems that everybody is making each other rich. And in a short-term game, it seems like everybody is making themselves rich.

Naval: I think that is a brilliant formulation. In a longterm game, it's positive sum. We're all baking the pie together. We're trying to make it as big as possible. And in a short term game, we're cutting up the pie.

Now this is not to excuse the socialists, right? The socialists are the people who are not involved in baking the pie, who show up at the end, and say, "I want a slice, or I want the whole pie." They show up with the guns.

But I think a good leader doesn't take credit. A good leader basically tries to inspire people, so the team gets the job done. And then things get divided up according to fairness, and who contributed how much, or as close to it as possible, and took a risk, as opposed to just whoever has the longest knife... the sharpest knife at the end.

Returns come from compound interest in iterated games

Nivi: So, these next two tweets are, "Play iterated games. All returns in life, whether in wealth, relationships, or knowledge come from compound interest."

Naval: When you have been doing business with somebody, you've been friends with somebody for ten years, twenty years, thirty years, it just gets better and better because you trust them so easily. The friction goes down, you can do bigger, and bigger things together.

For example, the simplest one is getting married to someone, and having kids, and raising children. That's compound interest, right? Investing in those relationships. Those relationships end up being invaluable compared to more casual relationships.

It's true in health and fitness. You know, the fitter you are, the easier it is to stay fit. Whereas the more you deteriorate your body, the harder it is to come back, and claw your way back to a baseline. It requires heroic acts.

Nivi: Regarding compound interest, I think I saw retweet something a while back. Maybe it was from Ed Latimore. It went something along the lines of, "Get some traction. Get purchase, and don't lose it"

[correction: the tweet is by @mmay3r]. So, the idea was to gain some initial traction, and never fall back, just keep ratcheting up, and up.

Naval: I don't remember it exactly. But I think that was right. Yes, it was like, "Get traction, and don't let go." It was a good one, yes.

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THE INTERNET HAS MASSIVELY BROADENED CAREER POSSIBILITIES

Nivi: Let's look at this next tweet, which I thought was cryptic, and also super interesting, about the kind of job or career that you might have. You said, "The internet has massively broadened the possible space of careers. Most people haven't figured this out yet."

Naval: The fundamental property of the internet more than any other single thing is it connects every human to each other human on the planet. You can now reach everyone.

Whether it's by emailing them personally, whether it's by broadcasting to them on Twitter, whether it's by posting something on Facebook that they find, whether it's by putting up a website they come and access.

It connects everyone to everyone. So, the internet is an inter-networking tool. It connects everybody. That is its superpower. So, you want to use that.

What that helps you figure out is the internet means you can find your audience for your product, or your talent, and skill no matter how far away they are.

For example, Nenad, who is Illacertus, if you look at his videos pre-internet, how would he get the message out there? It would just be ... what would he do? He would run around where he lives in his neighborhood showing it to people on a computer, or a screen? Or he would try to get it played at his local movie theater? It was impossible. It only works because he can put it on the internet.

And then how many people in the world are really interested in it? Or even in interested in what we're talking about are really gonna absorb it, right? It's gonna be a very small subset of humanity. The key is being able to reach them.

The Internet allows you to scale any niche obsession

So, what the internet does is allows any niche obsession, which could be just the weirdest thing. It could be like people who collect snakes, to like people who like to ride hot air balloons, to people who like to sail around the world by themselves, just one person on a craft, or someone who's obsessed with miniature cooking. Like, there's this whole Japanese miniature cooking phenomenon. Or there's a show about a woman who goes in people's houses, and tidies it up, right?

So, whatever niche obsession you have, the internet allows you to scale. Now that's not to say that what you build will be the next Facebook, or reach billions of users, but if you just want to reach 50,000 passionate people like you, there's an audience out there for you.

So the beauty of this is that we have 7 billion human beings on the planet. The combinatorics of human DNA are incredible. Everyone is completely different. You'll never meet any two people who are even vaguely similar to each other, that can substitute for each other.

It's not like you can say, "Well, Nivi, just left my life. So, I can have this other person come in, and he's just like Nivi. And I get the same feelings, and the same responses, and the same ideas." No. There are no substitutes for people. People are completely unique.

So, given that each person has different skillsets, different interests, different obsessions. And it's that diversity that becomes a creative superpower. So, each person can be creatively superb at their own unique thing.

But before that didn't matter. Because if you were living in a little fishing village in Italy, like your fishing village didn't necessarily need your completely unique skill, and you had to conform to just the few jobs that were available. But now today you can be completely unique.

You can go out on the internet, and you can find your audience. And you can build a business, and create a product, and build wealth, and make people happy just uniquely expressing yourself through the internet.

The space of careers has been so broadened. E-sports players, you know, people making millions of dollars playing Fortnite. People creating videos, and uploading them. YouTube broadcasters. Bloggers,

podcasters. Joe Rogan, I read, true or false, I don't know, but I read that he's gonna make about \$100 million a year on his podcast. And he's had 2 billion downloads.

Even PewDiePie... there's a hilarious tweet that I retweeted the other day. PewDiePie is the number one trusted name in news. This is a kid I think in Sweden, and he's got three times the distribution of the top cable news networks. Just on his news channel. It's not even on his entertainment channel.

Escape competition through authenticity

The internet enables any niche interest, as long as you're the best at it to scale out. And the great news is because every human is different, everyone is the best at something. Being themselves.

Another tweet I had that is worth kind of weaving in, but didn't go into this tweetstorm, was a very simple one. I like things when I can compress them down because they're easy to remember, and easy to hook onto. But that one was, "Escape competition through authenticity."

Basically, when you're competing with people it's because you're copying them. It's because you're trying to do the same thing. But every human is different. Don't copy.

I know we're mimetic creatures, and René Girard has a whole mimesis theory. But it's much easier than that. Don't imitate. Don't copy. Just do your own thing. No one can compete with you on being you. It's that simple.

And so the more authentic you are to who you are, and what you love to do, the less competition you're gonna have. So, you can escape competition through authenticity when you realize that no one can compete with you on being you. And normally that would have been useless advice pre-internet. Post-internet you can turn that into a career.

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GIVE SOCIETY WHAT IT DOESN'T KNOW HOW TO GET

Nivi: You're not gonna get rich renting out your time. But you say that, "you will get rich by giving society what it wants, but does not yet know how to get at scale."

Naval: That's right. So, essentially as we talked about before, money is IOUs from society saying, "You did something good in the past. Now here's something that we owe you for the future." And so society will pay you for creating things that it wants.

But society doesn't yet know how to create those things because if it did, they wouldn't need you. They would already be stamped out big time.

Almost everything that's in your house, in your workplace, and on the street used to be technology at one point in time. There was a time when oil was a technology, that made J.D. Rockefeller rich. There was a time when cars were technology, that made Henry Ford rich.

So, technology is just the set of things, as Alan Kay said, that don't quite work yet [correction: Danny Hillis]. Once something works, it's no longer technology. So, society always wants new things.

Figure out what product you can provide and then figure out how to scale it

And if you want to be wealthy, you want to figure out which one of those things you can provide for society, that it does not yet know how to get, but it will want, that's natural to you, and within your skillset, within your capabilities.

And then you have to figure out how to scale it. Because if you just build one of it, that's not enough. You've got to build thousands, or hundreds of thousands, or millions, or billions of them. So, everybody can have one.

Steve Jobs, and his team of course figured out that society would want smartphones. A computer in their pocket that had all the phone capability times 100, and be easy to use. So, they figured out how to build that, and then they figured out how to scale it.

And they figured out how to get one into every First World citizen's pocket, and eventually every Third World citizen too. And so because of that they're handsomely rewarded, and Apple is the most valuable company in the world.

Nivi: The way I tried to put it was that the entrepreneur's job is to try to bring the high end to the mass market.

Naval: It starts as high end. First it starts as an act of creativity. First you create it just because you want it. You want it, and you know how to build it, and you need it. And so you build it for yourself. Then you figure out how to get it to other people. And then for a little while rich people have it.

Like, for example rich people had chauffeurs, and then they had black town cars. And then Uber came along, and everyone's private driver is available to everybody. And now you can even see Uber pools that are replacing shuttle buses because it's more convenient. And then you get scooters, which are even further down market of that. So, you're right. It's about distributing what rich people used to have to everybody.

But the entrepreneur's job starts even before that, which is creation. Entrepreneurship is essentially an act of creating something new from scratch. Predicting that society will want it, and then figuring out how to scale it, and get it to everybody in a profitable way, in a self-sustaining way.

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LIVE BELOW YOUR MEANS FOR FREEDOM

Nivi: Any other big things you should avoid, other than renting out your time?

Naval: Yeah, there are two tweets that I put out that are related. The first one I was talking about where someone, like, how your lifestyle has to upgrade, shouldn't get upgraded too fast. And that one basically said, people who are living far below their means enjoy a freedom that people busy upgrading their lifestyles just can't fathom.

And I think that's very important, just to not upgrade your lifestyle all the time. To maintain your freedom. And it just gives you freedom of operation. You basically, once you make a little bit of money, you still want to be living like your old self, so that just the worry goes away. So, don't run out to upgrade that house, and lifestyle, and all that stuff.

The most dangerous things are heroin and a monthly salary

Let's say you're getting paid \$1,000 an hour. The problem is, is that when you go into a work lifestyle like that, you don't just suddenly go from making \$20 an hour to making \$1,000 an hour. That's a progression over a long career.

And as that happens, one subtle problem is that you upgrade your lifestyle as you make more, and more money. And that upgrading of the lifestyle kind of ups what you consider to be wealth, and you stay in this wage slave trap.

So, I forget who said it, maybe it was Nassim Taleb. But he said, "The most dangerous things are heroin, and a monthly salary." Right, because they are highly addictive. The way you want to get wealthy is you want to be poor, and working, and working, and working.

Ideally, you'll make your money in discrete lumps

And this is for example how the tech industry works. Where you don't make any money for ten years, and then suddenly at year eleven, you might have a giant payday.

Which is by the way one reason why these very high marginal tax rates for the so-called wealthy are flawed because the highest risk-taking, most creative professions you literally lose money for a decade over your life, while you take massive risk, and you bleed, and bleed, and bleed.

And then suddenly in year eleven, or year fifteen, you might have one single big payday. But then of course Uncle Sam show up, and basically say, "Hey, you know what, you just made a lot money this year. Therefore, you're rich. Therefore, you're evil and you've got to hand it all over to us." So, it just destroys those kinds of creative risk taking professions.

But ideally you want to make your money in discrete lumps, separated over long periods of time, so that your own lifestyle does not have a chance to adapt quickly, and then you basically say, "Okay, now I'm done. Now I'm retired. Now I'm free. I'm still gonna work because you got to do something with your life, but I'm gonna work on only the things that I want, when I want." And so you have much more creative expression, and much less about money.

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YOU WON'T GET RICH RENTING OUT YOUR TIME

Nivi: Next you go into more specific details on how you can actually get rich, and how you can't get rich. The first point was about how you're not going to get rich: "You are not going to get rich renting out your time. You must own equity—a piece of the business—to gain your financial freedom."

Naval: This is probably one of the absolute most important points. People seem to think that you can create wealth, and make money through work. And it's probably not going to work. There are many reasons for that.

But the most basic is just that your inputs are very closely tied to your outputs. In almost any salaried job, even at one that's paying a lot per hour like a lawyer, or a doctor, you're still putting in the hours, and every hour you get paid.

So, what that means is when you're sleeping, you're not earning. When you're retired, you're not earning. When you're on vacation, you're not earning. And you can't earn non-linearly.

If you look at even doctors who get rich, like really rich, it's because they open a business. They open like a private practice. And that private practice builds a brand, and that brand attracts people. Or they build some kind of a medical device, or a procedure, or a process with an intellectual property.

So, essentially you're working for somebody else, and that person is taking on the risk, and has the accountability, and the intellectual property, and the brand. So, they're just not gonna pay you enough. They're gonna pay you the bare minimum that they have to, to get you to do their job. And that can be a high bare minimum, but it's still not gonna be true wealth where you're retired.

Renting out your time means you're essentially replaceable

And then finally you're actually just not even creating that much original for society. Like I said, this tweetstorm should have been called "How to Create Wealth." It's just "How to Get Rich" was a more catchy title. But you're not creating new things for society. You're just doing things over and over.

And you're essentially replaceable because you're now doing a set role. Most set roles can be taught. If they can be taught like in a school, then eventually you're gonna be competing with someone who's got more recent knowledge, who's been taught, and is coming in to replace you.

You're much more likely to be doing a job that can be eventually replaced by a robot, or by an AI. And it doesn't even have to be wholesale replaced over night. It can be replaced a little bit at a time. And that kind of eats into your wealth creation, and therefore your earning capability.

So, fundamentally your inputs are matched to your outputs. You are replaceable, and you're not being creative. I just don't think that, that is a way that you can truly make money.

You must own equity to gain your financial freedom

So everybody who really makes money at some point owns a piece of a product, or a business, or some kind of IP. That can be through stock options, so you can be working at a tech company. That's a fine way to start.

But usually the real wealth is created by starting your own companies, or by even investors. They're in an investment firm, and they're buying equity. These are much more the routes to wealth. It doesn't come through the hours.

You want a career where your inputs don't match your outputs

You really just want a job, or a career, or a profession where your inputs don't match your outputs. If you look at modern society, again this is later in the tweetstorm. Businesses that have high creativity and high leverage tends to be ones where you could do an hour of work, and it can have a huge effect. Or you can do 1,000 hours of work, and it can have no effect.

For example, look at software engineering. One great engineer can for example create bitcoin, and create billions of dollars worth of value. And an engineer who is working on the wrong thing, or not quite as good, or just not as creative, or thoughtful, or whatever, can work for an entire year, and every piece of code they ship ends up not getting used. Customers don't want it.

That is an example of a profession where the input and the outputs are highly disconnected. It's not based on the number of hours that you put in.

Whereas on the extreme other end, if you're a lumberjack, even the best lumberjack in the world, assuming you're not working with tools, so the inputs and outputs are clearly connected. You're just using an ax, or a saw. You know, the best lumberjack in the world may be like 3x better than one of the worst lumberjacks, right? It's not gonna be a gigantic difference.

So, you want to look for professions and careers where the inputs and outputs are highly disconnected. This is another way of saying that you want to look for things that are leveraged. And by leveraged I don't mean financial leveraged alone, like Wall Street uses, and that has a bad name. I'm just talking about tools. We're using tools.

A computer is a tool that software engineers use. If I'm a lumberjack with bulldozers, and automatic robot axes, and saws, I'm gonna be using tools, and have more leverage than someone who is just using his bare hands, and trying to rip the trees out by the roots.

Tools and leverage are what create this disconnection between inputs and outputs. Creativity, so the higher the creativity component of a profession, the more likely it is to have disconnected inputs and outputs.

So, I think that if you're looking at professions where your inputs and your outputs are highly connected, it's gonna be very, very, hard to create wealth, and make wealth for yourself in that process.

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MAKE LUCK YOUR DESTINY

Nivi: I think it's pretty interesting that the first three kinds of luck that you described there are very common clichés for them that everybody knows. And then for that last kind of luck that comes to you out of the unique way that you act, there's no real cliché for it.

So, for the first three kinds, there's "dumb luck," or "blind luck." That's the first kind of luck. The second kind of luck there's the cliché that "fortune favors the bold." That's a person who gets lucky just by stirring the pot and acting. The third kind of luck, people say that "chance favors the prepared mind."

But for the fourth kind of luck, there isn't a common cliché out there that matches the unique character of your action, which I think is interesting and perhaps an opportunity and it also shows that people aren't necessarily taking advantage of that kind of luck the way they should be.

Naval: I think also at that point, it starts becoming so deterministic that it stops being luck. So, the definition starts fading from luck to more destiny. So, I would characterize that fourth one as you build your character in a certain way and then your character becomes your destiny.

Build your character so opportunity finds you

One of the things I think that is important to making money, when you want the kind of reputation that makes people do deals through you. I use the example of like, if you're a great diver then treasure hunters will come and give you a piece of the treasure for your diving skills.

If you're a trusted, reliable, high-integrity, long-term thinking deal maker, then when other people want to do deals but they don't know how to do them in a trustworthy manner with strangers, they will literally approach you and give you a cut of the deal or offer you a unique deal just because of the integrity and reputation that you have built up.

Warren Buffett, he gets offered deals, and he gets to buy companies, and he gets to buy warrants, and bailout banks and do things that other people can't do because of his reputation.

But of course that's fragile. It has accountability on the line, it has a strong brand on the line, and as we will talk about later, that comes with accountability attached.

But I would say your character, your reputation, these are things that you can build that then will let you take up advantage of opportunities that other people may characterize as lucky but you know that it wasn't luck.

Nivi: You said that this fourth kind of luck is more or less a destiny. There's a quote from that original book that was in Marc's blog posts from Benjamin Disraeli, who I think was the former prime minister of the UK. The quote to describe this kind of luck was, "we make our fortunes and we call them fate."

You have to be a little eccentric to be out on the frontier by yourself

There were a couple other interesting things about this kind of luck that were mentioned in the blog post, I think it'll be good for the listeners to hear about is that, this fourth kind of luck can almost come out of eccentric ways that you do your things and that eccentricity is not necessarily a bad thing in this case. In fact, it's a good thing.

Naval: Yeah, absolutely. Because the world is a very efficient place, so, everyone has dug through all the obvious places to dig and so to find something that's new and novel and uncovered, it helps to be operating on a frontier.

Where right there you have to be a little eccentric to be out on the frontier by yourself, and then you have to be willing to dig deeper than other people do, deeper than seems rational just because you're interested.

Nivi: Yeah, the two quotes that I've seen that express this kind of luck in addition to that Benjamin Disraeli one, are this one from Sam Altman where he said, "extreme people get extreme results." I think that's pretty nice. And then there's this other one from Jeffrey Pfeffer, who is a professor at Stanford that, "you can't be normal and expect abnormal returns." I've always enjoyed that one too.

Naval: Yeah. And one quote that I like which is the exact opposite of that is, "play stupid games win stupid prizes." A lot of people spend a lot of their time playing social games like on Twitter where you're trying to improve your social standing and you basically win stupid social prizes which are worthless.

Nivi: I guess the last thing that I have from this blog post is the idea that by pursuing these kinds of luck especially the last one, basically everything but dumb luck, by pursuing them you essentially run out of unluck. So, if you just keep stirring the pot and stirring the pot, that alone you will run out of unluck.

Naval: Yeah, or it could just be reversion to the mean. So, then you at least neutralized luck so that it's your own talents that come into play.

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MAKING MONEY ISN'T ABOUT LUCK

Naval: Obviously, we want to be wealthy, and we want to get there in this lifetime without having to rely on luck.

A lot of people think making money is about luck. It's not. It's about becoming the kind of person that makes money.

I like to think that if I lost all my money and if you drop me on a random street in any English-speaking country, within 5, 10 years I'd be wealthy again. Because it's a skill set that I've developed and I think anyone can develop.

In 1,000 parallel universes, you want to be wealthy in 999 of them. You don't want to be wealthy in the 50 of them where you got lucky. We want to factor luck out of it.

There's four kinds of luck that we're talking about. This came from a book. Marc Andreessen, wrote a blog post about it.

1. Blind luck

The first kind of luck you might say is blind luck. Where I just got lucky because something completely out of my control happened. That's fortune, that's fate.

2. Luck from hustling

Then there's luck that comes through persistence, hard work, hustle, motion. Which is when you're running around creating lots of opportunities, you're generating a lot of energy, you're doing a lot of things, lots of things will get stirred up in the dust.

It's almost like mixing a petri dish and seeing what combines. Or mixing a bunch of reagents and seeing what combines. You're generating enough force and hustle and energy that luck will find you.

We, as a group, you could argue, got together because of that. Nenad had put up these great videos online, I saw them on Twitter. In that sense, he generated his own luck by creating videos until people like me keep finding him.

3. Luck from preparation

A third way is that you become very good at spotting luck. If you are very skilled in a field, you will notice when a lucky break happens in that field. When other people who aren't attuned to it won't notice. So you become sensitive to luck and that's through skill and knowledge and work.

4. Luck from your unique character

Then the last kind of luck is the weirdest, hardest kind. But that's what we want to talk about. Which is where you build a unique character, a unique brand, a unique mindset, where then luck finds you.

For example, let's say that you're the best person in the world at deep sea underwater diving. You're known to take on deep sea underwater dives that nobody else will even attempt to dare.

Then, by sheer luck, somebody finds a sunken treasure ship off the coast. They can't get it. Well, their luck just became your luck, because they're going to come to you to get that treasure. You're going to get paid for it.

Now, that's an extreme example. The person who got lucky by finding the treasure chest, that was blind luck. But them coming to you and asking you to extract it and having to give you half, that's not luck.

You created your own luck. You put yourself in a position to be able to capitalize on that luck. Or to attract that luck when nobody else has created that opportunity for themselves. When we talk about "without getting lucky," we want to be deterministic, we don't want to leave it to chance.

In 1,000 parallel universes, you want to be wealthy in 999 of them

Nivi: Do you want to elaborate a little bit more on the idea that in a 1,000 parallel universes you want to get rich in 999 of them? I think some people are going to see that and say, "that sounds impossible, it sounds like it's too good to be true."

Naval: No, I don't think it's impossible. I think that you may have to work a little bit harder at it given your starting circumstances. I started as a poor kid in India, so if I can make it, anybody can, in that sense.

Now, obviously, I had all my limbs and I had my mental faculties and I did have an education. There are some prerequisites you can't get past. But if you're listening to this video or podcast, you probably have the requisite means at your disposal, which is a functioning body and a functioning mind.

And I've encountered plenty of bad luck along the way. The first little fortune that I made, I instantly lost in the stock market. The second little fortune that I made, or I should have made, I basically got cheated by my business partners. It's only the third time around has been a charm.

And, even then, it has been in a slow and steady struggle. I haven't made money in my life in one giant payout. It's always been a whole bunch of small things piling up. It's more about consistently creating wealth by creating businesses, including opportunities and creating investments. It hasn't been a giant one-off thing.

Wealth stacks up one chip at a time, not all at once

My personal wealth has not been generated by one big year. It stacks up little bit, chips at a time. More options, more businesses, more investments, more things that I can do.

Same way that someone like Nenad, illacertus, he's building his brand online. He's building videos. It's not like any one video is going to suddenly shower him with riches overnight. It's going to be a long lifetime of learning, of reading, of creating that's going to compound.

We're talking about getting wealthy so you can retire, so you have your freedom. Not retire in the sense that you don't do anything. But in the sense that you don't have to be any place you don't want to be, you don't have to do anything you don't want to do, you can wake up when you want, you can sleep when you want, you don't have a boss. That's freedom.

We're talking about enough wealth to get to freedom. Especially thanks to the Internet these days, though, opportunities are massively abundant. I, in fact, have too many ways to make money, I don't have enough time. I have opportunities pouring out of my ears and the thing I keep running out of is time.

There's just so many ways to create wealth, to create products, to create businesses, to create opportunities, and to, as a byproduct, get paid by society that I can't even handle it all.

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FREE MARKETS ARE INTRINSIC TO HUMANS

Naval: Overall capitalism [meaning free markets] is intrinsic to the human species. Capitalism is not something we invented. Capitalism is not even something we discovered. It is in us in every exchange that we have.

When you and I exchange information, I want some information back from you. I give you information. You give me information. If we weren't having a good information exchange, you'd go talk to somebody else. So, the notion of exchange, and keeping track of credits and debits, this is built into us as flexible social animals.

We are the only animals in the animal kingdom that cooperate across genetic boundaries. Most animals don't even cooperate. But when they do, they cooperate only in packs where they co-evolve together, and they share blood, so they have some shared interests.

Humans don't have that. I can cooperate with you guys. One of you is a Serbian. The other one is a Persian by origin. And I'm Indian by origin. We have very little blood in common, basically none. But we still cooperate.

What lets us cooperate? It's because we can keep track of debits and credits. Who put in how much work? Who contributed how much? That's all free market capitalism is.

So, I strongly believe that it is innate to the human species, and we are going to create more and more wealth, and abundance for everybody.

Everybody can be wealthy. Everybody can be retired. Everybody can be successful. It is merely a question of education and desire. You have to want it. If you don't want it, that's fine. Then you opt out of the game.

But don't try to put down the people who are playing the game. Because that's the game that keeps you in a comfortable warm bed at night. That's the game that keeps a roof over your head. That's the game that keeps your supermarkets stocked. That's the game that keeps the iPhone buzzing in your pocket.

So, it is a beautiful game that is worth playing ethically, rationally, morally, socially for the human race. It's going to continue to make us all richer and richer, until we have massive wealth creation for anybody who wants it.

Too many takers and not enough makers will plunge a society into ruin

Nivi: It's not just individuals secretly despising wealth, right? There are countries, groups, political parties that overtly despise wealth. Or at least seem to.

Naval: That's right. What those countries, political parties, and groups are reduced to is playing the zero-sum game of status. In the process to destroy wealth creation, they drag everybody down to their level.

Which is why the U.S. is a very popular country for immigrants because of the American dream. Anyone can come here, be poor, and then work really hard and make money, and get wealthy. But even just make some basic money for their life.

Obviously, the definition of wealth is different for different people. A First World citizen's definition of wealth might be, "Oh, I have to make millions of dollars, and I'm completely done."

Whereas to a Third World poor immigrant just entering the country, and we were poor immigrants who came here when I was fairly young, to the United States, wealth may just be a much lower number. It may just be, "I don't have to work a manual labor job for the rest of my life that I don't want to work."

But groups that despise it will essentially bring the entire group to that level. If you get too many takers, and not enough makers, society falls apart. You end up with a communist country.

Look at Venezuela, right? They were so busy taking, and dividing, and reallocating, that people are literally starving in the streets, and losing kilograms of body weight every year just from sheer starvation.

Another way to think about it is imagine an organism that has too many parasites. You need some small number of parasites to stay healthy.

You need a lot of symbiotes. All the mitochondria in all of our cells that help us respire and burn oxygen. These are symbiotes that help us survive. We couldn't survive without them.

But, to me, those are partners in the wealth creation that creates the human body. But if you just were filled with parasites, if you got infected with worms, or a virus, or bacteria that were purely parasitical, you would die. So, any organism can only withstand a small number of parasites. When the parasitic element gets too far out of control, you die.

Again I'm talking about ethical wealth creation. I'm not talking about monopolies. I'm not talking about crony capitalism. I'm not talking about mispriced externalities like the environment.

I'm talking about free minds, and free markets. Small-scale exchange between humans that's voluntary, and doesn't have an outsized impact on others.

I think that kind of wealth creation, if a society does not respect it, if the group does not respect it, then society will plunge into ruin, and darkness.

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MAKE ABUNDANCE FOR THE WORLD

Naval: I think there is this notion that making money is evil, right? It's rooted all the way back down to "money is the root of all evil." People think that the bankers steal our money. It's somewhat true in that, in a lot of the world, there's a lot of theft going on all the time.

The history of the world, in some sense, is this predator/prey relationship between makers and takers. There are people who go out and create things, and build things, and work hard on things.

Then there are people who come along with a sword, or a gun, or taxes, or crony capitalism, or Communism, or what have you. There's all these different methods to steal.

Even in nature, there are more parasites than there are non-parasitical organisms. You have a ton of parasites in you, who are living off of you. The better ones are symbiotic, they're giving something back. But there are a lot that are just taking. That's the nature of how any complex system is built.

What I am focused on is true wealth creation. It's not about taking money. It's not about taking something from somebody else. It's from creating abundance.

Obviously, there isn't a finite number of jobs, or finite amount of wealth. Otherwise we would still be sitting around in caves, figuring out how to divide up pieces of fire wood, and the occasional dead deer.

Most of the wealth in civilization, in fact all of it, has been created. It got created from somewhere. It got created from people. It got created from technology. It got created from productivity. It got created from hard work. This idea that it's stolen is this horrible zero-sum game that people who are trying to gain status play.

Everyone can be rich

But the reality is everyone can be rich. We can see that by seeing, that in the First World, everyone is basically richer than almost anyone who was alive 200 years ago.

200 years ago nobody had antibiotics. Nobody had cars. Nobody had electricity. Nobody had the iPhone. All of these things are inventions that have made us wealthier as a species.

Today, I would rather be a poor person in a First World country, than be a rich person in Louis the XIV's France. I'd rather be a poor person today than aristocrat back then. That's because of wealth creation.

The engine of technology is science that is applied for the purpose of creating abundance. So, I think fundamentally everybody can be wealthy.

This thought experiment I want you to think through is imagine if everybody had the knowledge of a good software engineer and a good hardware engineer. If you could go out there, and you could build robots, and computers, and bridges, and program them. Let's say every human knew how to do that.

What do you think society would look like in 20 years? My guess is what would happen is we would build robots, machines, software and hardware to do everything. We would all be living in massive abundance.

We would essentially be retired, in the sense that none of us would have to work for any of the basics. We'd even have robotic nurses. We'd have machine driven hospitals. We'd have self-driving cars. We'd have farms that are 100% automated. We'd have clean energy.

At that point, we could use technology breakthroughs to get everything that we wanted. If anyone is still working at that point, they're working as a form of expressing their creativity. They're working because it's in them to contribute, and to build and design things.

I don't think capitalism is evil. Capitalism is actually good. It's just that it gets hijacked. It gets hijacked by improper pricing of externalities. It gets hijacked by improper yields, where you have corruption, or you have monopolies.

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SEEK WEALTH, NOT MONEY OR STATUS

This is my first interview on How to Get Rich, based on my tweetstorm on the same topic. The podcast is available on Apple, Breaker, Google, Overcast, Spotify, YouTube and other podcast apps. These transcripts have been edited for clarity.

Naval is a prolific tech investor and founder of AngelList

Nivi: You probably know Naval from his Twitter account.

We're going to be talking about his tweetstorm on "How to get rich (without getting lucky)." We're going to go through most of the tweets in detail, give Naval a chance to expand on them and generally riff on the topic. He'll probably throw in some ideas that he hasn't even published before.

Naval's the co-founder of AngelList and Epinions. He's also a prolific tech investor in companies like Twitter, Uber, and many more.

I'm Nivi, the co-founder of AngelList with Naval. And I co-authored the Venture Hacks blog with him back in the day.

Naval: The How To Get Rich tweetstorm definitely hit a nerve and went viral. A lot of people say it was helpful and reached across aisles.

People outside of the tech industry, people in all walks of life, people want to know how to solve their money problems. Everyone vaguely knows that they want to be wealthy, but they don't have a good set of principles to do it by.

Wealth is assets that earn while you sleep

Nivi: What's the difference between wealth, money, and status?

Naval: Wealth is the thing that you want. Wealth is assets that earn while you sleep. Wealth is the factory, the robots, that's cranking out things. Wealth is the computer program that's running at night, that's serving other customers. Wealth is even money in the bank that is being reinvested into other assets, and into other businesses.

Even a house can be a form of wealth because you can rent it out, although that's probably a lower use of productivity of land than doing some commercial enterprise.

So, my definition of wealth is much more businesses and assets that can earn while you sleep.

Wealth buys your freedom

The reason you want wealth is because it buys you your freedom. So, you don't have to wear a tie like a collar around your neck. So, you don't have to wake up at 7:00 AM, and rush to work, and sit in commute traffic. So, you don't have to waste away your entire life grinding all your productive hours away into a soulless job that doesn't fulfill you.

So, the purpose of wealth is freedom. It's nothing more than that. It's not to buy fur coats, or drive Ferraris, or sail yachts, or jet around the world in your Gulfstream. That stuff gets really boring and really stupid, really fast. It's really so that you are your own sovereign individual.

You're not going to get that unless you really want it. The entire world wants it and the entire world is working hard at it.

To some extent it is competitive. It's a positive sum game, but there are competitive elements to it. Because there's a finite amount of resources right now in society. To get the resources to do what you want, you have to stand out.

Money is how we transfer wealth

Money is how we transfer wealth. Money is social credits. It is the ability to have credits and debits of other people's time.

If I do my job right, if I create value for society, society says, "Oh, thank you. We owe you something in the future for the work that you did in the past. Here's a little IOU. Let's call that money."

That money gets debased because people steal the IOUs. The government prints extra IOUs. People renege on their IOUs. But money is trying to be a reliable IOU from society that you are owed something for something you, or someone who gave you the money, did in the past.

We can transfer these IOUs around. So, money is how we transfer wealth.

Status is your rank in the social hierarchy

There are fundamentally two huge games in life that people play. One is the money game. Because money is not going to solve all of your problems, but it's going to solve all of your money problems. I think people know that. They realize that, so they want to make money.

But at the same time, many of them deep down believe that they can't make it. They don't want any wealth creation to happen. So, they virtue signal by attacking the whole enterprise by saying, "Well, making money is evil. You shouldn't do it."

But they're actually playing the other game, which is the status game. They're trying to be high status in the eyes of other people watching by saying, "Well, I don't need money. We don't want money."

Status is your ranking in the social hierarchy.

Wealth is not a zero-sum game. Everybody in the world can have a house. Because you have a house doesn't take away from my ability to have a house. If anything, the more houses that are built, the easier it becomes to build houses, the more we know about building houses, and the more people that can have houses.

Wealth is a very positive sum game. We create things together. We're starting this endeavor to create this piece of art that explains what we're doing. At the end of it, something brand new will be created. It's a positive sum game.

Status is a very old game

Status, on the other hand, is a zero-sum game. It's a very old game. We've been playing it since monkey tribes. It's hierarchical. Who's number one? Who's number two? Who's number three? And for number three to move to number two, number two has to move out of that slot. So, status is a zero-sum game.

Politics is an example of a status game. Even sports is an example of a status game. To be the winner, there must be a loser. I don't fundamentally love status games. They play an important role in our society, so we can figure out who's in charge. But fundamentally, you play them because they're a necessary evil.

On an evolutionary basis, if you go back thousands of years, status is a much better predictor of survival than wealth is. You couldn't have wealth before the farming age because you couldn't store things. Hunter-gatherers carried everything on their backs.

So, hunter-gatherers lived in entirely status based societies. Farmers started going to wealth-based societies. And the modern industrial economies are much more heavily wealth-based societies.

People creating wealth will always be attacked by people playing status games

There's always a subtle competition going on between status and wealth. For example, when journalists attack rich people, or attack the technology industry, they're really bidding for status. They're saying, "No, the people are more important. And I, the journalist, represent the people, and therefore I am more important."

The problem is that to win at a status game, you have to put somebody else down. That's why you should avoid status games in your life because they make you into an angry combative person. You're always fighting to put other people down, to put yourself and the people you like up.

Status games are always going to exist. There's no way around it, but realize that most of the time, when you're trying to create wealth, you're getting attacked by someone else, and they're trying to look like a goody-two shoes.

They're trying to up their own status at your expense. They're playing a different game. And it's a worse game. It's a zero-sum game, instead of a positive sum game.

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THE NEED FOR INDIFFERENCE

A FOUNDER'S ANXIETY

ON HUMILITY

ON MEDITATION

THE TRUTH ABOUT HARD WORK

AMERICAN FALL

This is a sequel. Read American Spring first.

“We conclude that the concentration of wealth is natural and inevitable, and is periodically alleviated by violent or peaceable partial redistribution. In this view all economic history is the slow heartbeat of the social organism, a vast systole and diastole of concentrating wealth and compulsive recirculation.”

– Will and Ariel Durant

In 2016, the American Republic birthed a second political party.

This came as a shock to the prosperous, college-educated Elites. The four horsemen of technology, trade, immigration, and bailouts had let them manufacture products, labor, voters, and money at will.

The people ruled the things, the politicians ruled the people, and the bankers ruled them all.

Elite America clustered on the temperate coasts, connected by airplanes and fiber optics. Its vision of open markets and open borders was supposed to eventually integrate the commoners in the interior.

But the Internet had turned media into a choose-your-own-reality adventure. Crowd funding and crowd media let the masses self assemble. Masses who had lost their livelihoods to trade, immigrants, and mechanization, and lost their culture to the march of progress.

The idealists, led by Bernie, were the first to storm the gates. It took the full might of the Media, the Party, and the Financiers to throw them from the walls. On the other front, Populists led by Trump broke through and seized the Republican banner.

The new Populists shared little with the old Republicans. They didn't want to roll back entitlements and saw the culture wars as a distraction. They no longer wanted to send their children to fight wars declared by the Elites. They were tired of subsidizing naked gambling on Wall Street. They were out of sympathy for the wretched masses huddled at the border.

The great fake war is over, and the Republicans lost.

Now, the Populists are rallied behind Trump – a reality TV star who built a brand out of building brands. With slowing growth, they want to put America and Americans first. Never mind that high walls and high tariffs won't stop the robots from taking all of the jobs in the end.

With the Bush dynasty failed, the Elites have consolidated behind a second Clinton. "L'État, c'est moi," they say.

If the New Democrats remind you of the old Republicans, consider that they both always had war, immigration, bailouts, and trade in common. The poorest now unexpectedly find themselves sheltering with the neocons, the Chamber of Commerce, Wall Street, lobbyists, and every nervous foreign regime dependent on American financial and military largesse. Mirroring an unstable Middle Eastern state, an uneasy alliance of elites and minorities rules over the angry masses, even as the blue-collar workers and trade unions slip out the back door.

The Libertarians, the Greens, and the Socialists find themselves homeless once again, now joined by a moral minority.

This is the first battle, the beginning of a long war. Just as the rifle and the printing press once did, the technologies of crowd media and crowd funding have redistributed power between the Populists and the Elites.

Minorities, Elites, and white males have already picked sides. The remaining battles will be fought over white women and their issues. Just as the British Empire, and not Britain, fought most of its wars, the shock troops for the Elites are the most threatened and vulnerable minorities in the populace. The Elites set the strategy, the press issues the orders, and the poor take to the streets.

The Elites have money, media, colleges, institutions, and numbers. Through histrionics they will defeat Trump, through demographics, the mob. As for the displaced, let them eat quinoa!

Any victory in November will be short lived – the Populists, on left and right, are here to stay. A future leader somewhere between Trump and Bernie could unite them to victory at the ballot box. If not, and if the Populists are convinced that the system cannot be redeemed, a true American Spring may be upon us.

History's classic solution is either politics distributing prosperity or revolution distributing poverty. Thankfully, the last real insurrection was settled 150 years ago. All that remains of that dispute is the re-enactment called Sunday night football.

Disturbingly, the gun owners, the police, and the military are in the wrong demographic. Who, the Elites wonder, is sitting on the hundreds of millions of guns and over a trillion bullets out there? How, exactly, are the unarmed Americans going to disarm the armed Americans? Even for the blissful turkey, Thanksgiving eventually arrives.

Technology-created prosperity may be a third way out, but technology displaces one generation as it prepares the next. The abundance that it creates is hardly a substitute for the self-determination and meaning that people crave.

Ultimately, it may be the Elites that sue for secession. Just like Syria and Iraq, perhaps America is two countries now – the coasts and the center, the city and the country, the Elites and the Populists. Social media and identity politics reinforce tribalism, and expose the absurdity of ruling sea to shining sea from a single iron throne.

If a new Berlin wall were to go up, we'd have to put it somewhere in Austin.

Perhaps a stable solution exists. In the meantime, it's war in November, the most polarized election in memory. Trump's demand is simple – "America first!" So is Clinton's warning – "Après moi, le déluge."

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AMERICAN SPRING

A one party system ran the United States, and the United States ran the world.

The US had checks and balances – governing required consensus, and the people were freed from kings. To protect speech, the framers left out a rule against conspiracies to monopolize the vote.

Political parties formed to monopolize the vote. The losing parties kept ganging up until only two parties remained. Resembling vast and immortal corporations, they consolidated all political power.

The parties need mass media to win elections. Media literally intermediates reality and programs voters by framing the acceptable parameters of any debate. Mass media costs mass money.

The elites, a plutocracy of the top few percent, bought the parties. So cheaply in fact, that they bought both.

The elites are merely people that went to the right schools, grew up in the right neighborhoods, and came from the right money and the right families. It's not a formal conspiracy – rather an intricate and distributed system, organized by the invisible hand of the market, voting with dollars and newspaper ink, and controlling the country all the same.

Within some parameters, the elites argue – bombs from the air or boots on the ground? How much should we tax income?

Mostly the elites agree to keep power with elite institutions, controlling the masses who cannot be trusted. Yes to wars, yes to mass surveillance, yes to bailouts, yes to war on drugs, yes to war on terror, yes to endless copyrights, yes to monopolies and oligopolies, no to term limits, no to wealth taxes... On these and others, pick R or D, there are no choices.

The Elite Party runs the system and it basically works. The elite stay elite. Income may be taxed, but wealth compounds. The most belligerent and implacable of the masses are sent to fight in mercifully

distant wars. Crime happens in other people's neighborhoods. The prisons are full and everyone is being watched. The pie expands, slowly and un-evenly, and all is well.

One weakness – the presidency is a single office of great visibility and power, directly and democratically elected. One person, one vote. Regardless of education, ethic, breeding, knowledge, achievement. Is everyone actually, really, equally qualified to vote, the elites wonder?

The elites lock the crown behind two massive gates – it costs a billion dollars to run for president. And incalculable, favorable mass media exposure.

This works well – so well that the elites get lazy, handing off presidential power within dynasties – between fathers and sons, husbands and wives.

Statistically speaking, what are the odds that the two most qualified candidates to be president out of 300 million people are siblings? Or married?

Barack Obama interrupts an in-process coronation. Using hope, change, and emerging alternative online media, he organizes and brings new voters to the polls. But back then, it still takes television, money, newspapers, and the party apparatus. He can't and doesn't do it alone, and eventually joins the elite.

Today, it's a different world. YouTube, Twitter, and Facebook let one human broadcast to billions, without permission, without censors, without delay. Social media makes mass organization and resistance possible.

The Arab Spring is just one consequence. The American Spring of 2016 is another.

Social and alternative media dominates and disintermediates mass media. Every column brings a hundred rebuttals. The New York Times and the Wall Street Journal are stood like commoners next to bloggers, begging for tweets, likes, and votes. We are all journalists and editors now.

Bernie can play this game. The MoveOn crowd organizes effortlessly using the new media.

Trump can play this game. The reality show vet generates outrage and impressions, tweeting as he goes.

Meanwhile, the Internet kills the political ad. Everyone is online – skipping, blocking, or just mis-clicking.

Bernie spends a bit on ads. Trump doesn't bother.

It's not just publishing – the Internet lets anyone donate little bits online. Bernie taps the crowd – over a million dollars a day from small donors! Again, Trump doesn't bother. He just self-finances.

The mass media barrier is down. The money barrier is down.

A mob is pushing Bernie. Trump is pulling one behind him.

The elites are livid. They sneer at the masses – Uneducated. Socialist. Racist. Luddite.

Throughout history, elites and plutocrats have feared direct democracy. One-person, one-vote logically leads towards mob rule. Socialism. Tribalism. The masses are always “crazier” than the elites. The elites like the status quo, so they pull policy towards the center. It's the masses that want real change.

YouTube killed TV and Twitter ate the news. Donald's tweeting from his jet and Bernie's kickstarter went viral. Software is eating politics and the elites have lost control.

Now we see “of the people, by the people, and for the people.” The neatly labeled bundles of “Democrat” and “Republican” are going to get re-assembled by the voters, one vote at a time instead of one dollar at a time.

Sanders' voters think the rich stole their money. Trump's voters think the illegals stole their jobs.

There is no more establishment. Like all things Internet, social media and crowd financing are unstoppable. Every large future election will have outsiders out-organizing, out-raising, and out-raging the establishment.

America is going from a republic of elites to a direct democracy. Look to your left, and look to your right.
Wake up – the people are here.

Update: Read the sequel, American Fall.

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THE FIFTH PROTOCOL

“Wait a minute... Make up your mind. This Snow Crash thing—is it a virus, a drug, or a religion?”

Juanita shrugs. “What’s the difference?”

– Snow Crash

Cryptocurrencies will create a fifth protocol layer powering the next generation of the Internet.

Humans don’t **need** math-based cryptocurrencies when dealing with other humans. We walk slowly, talk slowly, and buy big things. Credit cards, cash, wires, checks – the world seems fine.

Machines, on the other hand, are far chattier and quicker to exchange information. The Four Layers of the Internet Protocol Suite are constantly communicating. The Link Layer puts packets on a wire. The Internet Layer routes them across networks. The Transport Layer persists communication across a given conversation. And the Application Layer delivers entire documents and applications.

This chatty, anonymous network treats resources as “too cheap to meter.” It’s a giant grid that transfers data but doesn’t transfer value. DDoS attacks, email spam, and flooded VPNs result. Names and identities are controlled by overlords – ICANN, DNS Servers, Facebook, Twitter, and Certificate “Authorities.”

Where’s the protocol layer for exchanging value, not just data? Where’s the distributed, anonymous, permission-less system for chatty machines to allocate their scarce resources? Where is the “virtual money” to create this “virtual economy?”

Cryptocurrencies like Bitcoin are already trustless – any machine can accept it from any other, securely. They are (nearly) free. They are global – no central bank required, and any machine can speak the language. And they’re one to two steps from being quick, anonymous, and capable of authentication.

Suppose we had a QuickCoin, which cleared transactions nearly instantly, anonymously, and for infinitesimal mining fees. It could use the Bitcoin blockchain for security or for easy trading in and out. SMTP would demand QuickCoin to weed out spam. Routers would exchange QuickCoin to shut down DDoS attacks. Tor Gateways would demand Quickcoin to anonymously route traffic. Machines would bypass centralized DNS and OAuth servers, using Coins to establish ownership.

Why stop at one Coin? Let's posit a dozen new Appcoins. Using application-specific coins rewards the open-source developers with a pre-mined quantity. A TorCoin can be paid to its developers and gateways and by Tor users, achieving consensus via proof-of-bandwidth. We can allocate any scarce network resource this way – i.e., BoxCoin for Storage, CacheCoin for Caching, etc.

Lets move on to other networks. Can a completely distributed grid of small generators trade power with each other, using a decentralized and trustless cryptocurrency? Can a traffic jam of self-driving cars clear itself as the computerized vehicles bid for right of way? Can a mass of people crossing a street take priority over a single car waiting at the traffic light, as their phones vote, trustlessly and reliably, for their presence? Can we efficiently route networks of assets like water and power, and liabilities like pollutants and sewage, across a distributed grid? Can we trade stocks and financial assets with no brokers, custodians, or agents?

Cryptocurrencies are electronic cash, and as such, will be used by electronic agents to exchange value, verify contracts, and track identity and reputation. All of a sudden, the computing resources spent by the Bitcoin miners doesn't seem wasted – it seems efficient, given that it can be used for congestion control and routing of other network resources.

Cryptocurrencies are an emergent property of the Internet – almost a fifth protocol in the Internet suite. If Satoshi Nakamoto did not exist, it would still be necessary to invent them. Someday, they will be used by the machines in our network, on our desk, in our garage, and in our pocket to exchange value and achieve consensus at blinding speeds, anonymously, and at minimal cost.

When that day arrives, large distributed networks that we rely upon will change. Starting with the Internet, they will become de-centralized market economies, far more intelligent than they are today. Just as human brains co-evolved with our ability to trade and exchange goods with people who weren't related to us, so the network will become more intelligent as it learns to trade currency and contracts with unrelated nodes.

Eventually, there will be no functioning Internet or Internet of Things at the protocol layer without deep cryptocurrency integration. Turning off this fifth protocol will be impossible. Cryptocurrencies also remain mediums of exchange and stores of value. Nation states that are used to imposing capital controls will

face a quandary – ban cryptocurrencies, and live in the technology dustbin. Enable them, and this virus, this religion, this protocol – will enable the free flow of money and language, along with packets, around the globe.

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THE BITCOIN MODEL FOR CROWDFUNDING

Bitcoin is not just a protocol or money, it's a new business model for Open Source Software. Prior to Bitcoin, you had to raise money, write software, distribute your product, build a business model, and work towards liquidity. Angels, VCs, salespeople and bankers guided you the entire way, through a maze of tolls and controls.

The Bitcoin model for crowdfunding dispenses with everything except the software:

This is true crowdfunding – get funded by your users in proportion to their usage. Reward early adopters, network operators, and developers with upside.

In economics, the artificially scarce token used to allocate scarce resources is called “money.” So Bitcoin is crowd-funded OSS to run an Economic network. Now, a new generation of Appcoins can be created as open source software, crowd-funded into existence, and go public on day one. They can run networks where Bitcoin may not work, or where separate funding and compensation is needed.

The Tor network is slow because it relies on volunteers to relay traffic. Anytime we see a line, the product in question is underpriced. Let's crowd-fund a Torcoin – users of relays will pay in Torcoins and operators of relays will get paid in TorCoins. Founding developers collect equity when TorCoins are first mined and sold. Non-founding developers and network operators are paid revenues from newly mined coins and transaction fees.

Can we just use Bitcoin instead of Torcoin? Isn't money supposed to be fungible to all use cases? Perhaps not – Bitcoin's transaction speed is too slow for a dynamic network allocating bandwidth – 10 to 60 minutes is far too long to negotiate with a relay. And payments have to be anonymous. So a fast-clearing (Fastcoin can clear a block in 12 seconds), fully anonymous (like Zerocoin) variant is needed.

What else can we allocate in a network? NameCoin is already working on Distributed DNS. Can we build a striped, encrypted, high-availability data store using Boxcoin which pays for disk availability? Can we build a caching infrastructure using Cachecoin which pays edge nodes with un-used resources to cache large, static content? A DDoScoin used by web servers to throttle incoming browser requests? A PKIcoin that provides a global, un-assailable encrypted and anonymous messaging network? Are there more applications, like Bitcoin, that map to the real world and bypass network resources altogether?

In a world of numerous Appcoins, easy to create, integrate, and crowdfund, what's the role of Bitcoin?

Bitcoin itself will be used as the currency of choice in many cases, when its slow transaction clearing and pseudonymity are not issues. And most of the world's resources are not networked software which can benefit from its own Appcoin.

Some Appcoins may just be a protocol layer on top of Bitcoin to explicitly reward the creators, operators, and early adopters of the Appcoin's network. PKIcoin may only be a financial incentive, security outsourced to the Bitcoin mining pool, with entry / egress to PKIcoin through Bitcoin. In the cases that the Bitcoin blockchain is insufficient, such as Torcoin, Bitcoin will still be a reserve currency of sorts for moving into and out of Torcoin.

Bitcoin is more than money, and more than a protocol. It's a model and platform for true crowdfunding – open, distributed, and liquid all the way.

Thanks to Balaji Srinivasan for helping think through many of the ideas in this post. It's really at least half his work. If you don't follow him on twitter @balajis , you really should).

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BITCOIN – THE INTERNET OF MONEY

This post is old – I wrote it for Wired, which just published an excerpt in “The Wired World in 2014” issue, but the article was written in July. Apologies for the obsolescence.

Bitcoin will eventually be recognized as a platform for building new financial services.

Most people are only familiar with (b)itcoin the electronic currency, but more important is (B)itcoin, with a capital B, the underlying protocol, which encapsulates and distributes the functions of contract law.

Bitcoin encapsulates four fundamental technologies:

Thanks to these technical underpinnings, bitcoins are scarce (Central Banks can't inflate them away), durable (they don't degrade), portable (can be carried and transmitted electronically or as numbers in your head), divisible (into trillionths), verifiable (through everyone's block chain), easy to store (paper or electronic), fungible (each bitcoin is equal), difficult to counterfeit (cryptographically impossible), and can achieve widespread use – many of the technologists that brought us advances on the Internet are now working overtime to improve Bitcoin.

Proponents of the role of government argue that a currency with fixed supply will fail. They posit that inflation is required to keep people spending and that prices and wages are still as sticky as they were decades ago. They overlook that the world functioned on fixed money supplies until 40 years ago (the gold standard), and that bitcoin can gather many uses and value long before it has to become the main currency in which all prices are denominated. Another fear is that a central actor could take over the Bitcoin computing network – but the combined Bitcoin distributed supercomputer runs at the equivalent of 2,250 PetaFLOPS, 90x the rate of the fastest supercomputer (note – in Nov, it's now 48,000 PetaFLOPS!), and consumes an infinitesimal fraction of the resources used by a bloated banking system. Many label it as a speculative pyramid scheme – without realizing that all government-printed money is such. To the extent anyone holds cash over other assets, they are speculating that other assets will decline in relative value. Concerns abound over the security of the encryption scheme, the speed of transactions, the size of the block chain, the irreversibility of the transactions, and the potential for hacking and theft. All are fixable through third-party services and protocol upgrades. It's better to think about Bitcoin the protocol as Bitcoin 1.0, destined to evolve just as HTTP 1.0 evolved beyond of simple text and image-only web-browsers.

So why not just use Pounds or Dollars? One can use bitcoins as high-powered money with distinct advantages. Bitcoins, like cash, are irrevocable. Merchants don't have to worry about shipping a good, only to have a customer void the credit card transaction and charge-back the sale. Bitcoins are easy to send – instead of filling forms with your address, credit card number, and verification information, you just send money to a destination address. Each such address is uniquely generated for that single transaction, and therefore easily verifiable. Bitcoins can be stored as a compact number, traded by mere voice, printed on paper, or sent electronically. They can be stored as a passphrase that exists only in your head! There is no threat of money printing by a bankrupt government to dilute your savings. Transactions are pseudonymous – the wallets do not, by default have names attached to them, although transaction chains are easy to trace. It has near-zero transaction costs – you can use it for micropayments, and it costs the same to send 0.1 bitcoins or 10,000 bitcoins. Finally, it is global – so a Nigerian citizen can use it to safely transact with a US company, no credit or trust required.

Even more importantly, Bitcoin the protocol will enable financial services transactions that are not possible today or require expensive and powerful third-parties.

Bitcoin has a scripting language which enables more than a “send money from X to Y” transaction. A Bitcoin transaction can require M of N parties to approve a transaction. Imagine Wills that automatically unlock when most of the heirs agree that their parent has passed, no lawyer required. Or business accounts that require two of any three trusted signatures to approve an expenditure. Or wire escrows that go through when any arbiter agrees that the supplier sent the goods to the buyer. Or wallets that are socially secured by your friends and family. Or an allowance account accessible by the child and either of two parents. Or a crowdfunding of a Kickstarter project that pays out on milestones, based on the

majority of the backers approving the next payment. The escrow in each case can be locked so that the arbiters can't take the money themselves – only approve or deny the transaction.

The scripting language can also unlock transactions based on other parameters. Unlocking them over time can enable automatic mortgage, trust, and allowance payouts. Unlocking them on guessable numbers creates a lottery auditable by third parties. One can even design smart property – for example, a car's electronic key so that when and only when a payment is made by the car buyer to the seller, the seller's car key stops working and the buyer's car key (or mobile phone) starts the car. Imagine your self-driving car negotiating traffic, paying fractional bitcoin to neighboring cars in exchange for priority.

Everyone has a copy of the Bitcoin block chain, so anyone can verify your transactions. You can write software that will crawl the block chain and generate automatic accounting histories for tax and verification purposes. You can engaged in "Trusted Timestamping" – take a cryptographic signature of any document, timestamp it, and put it into the block chain. Anyone can verify that the document existed at a given time. If you sign the document with your private key and another party signs it with theirs, it becomes an undeniable mutually-signed contract. This entirely eliminates notaries and websites like <https://www.proofofexistence.com/> are showing the concept. The Namecoin project is building a distributed Domain Name System that allocates and resolve Domain Names without needing ICANN or Verisign, by using the block chain to establish proof-of-ownership. Similarly, look for entrepreneurs to apply this authoritative proof-of-ownership to built P2P Stock and Bond Exchanges – at least one Bitcoin site, "Satoshi Dice," has sold shares and issues dividends without using a stock exchange. The ownership and dividends are easily verifiable by anyone who wants to look inside the block chain. Predictionous.com is combining the transaction scripting and the verifiability to create a prediction market in which you cannot be cheated and third-party arbiters can allocate the winnings.

Bitcoin's "send-only" and irreversible nature makes it much less vulnerable to theft. Today, anyone with your Credit Card or E-Check (ACH) information can pull money from your account. This creates chargebacks, expensive dispute resolution and merchants double-checking your identity. Bitcoin is send only. Anyone who has received bitcoins from you can't request or pull more money from your account.

Most importantly, Bitcoin offers an open API to create secure, scriptable e-cash transactions. Just as the web democratized publishing and development, Bitcoin can democratize building new financial services. Contracts can be entered into, verified, and enforced completely electronically, using any third-party that you care to trust, or by the code itself. For free, within minutes, without possibility of forgery or revocation. Any competent programmer has an API to cash, payments, escrow, wills, notaries, lotteries, dividends, micropayments, subscriptions, crowdfunding, and more. While the traditional banks and credit card companies lock down access to their payments infrastructure to a handful of trusted parties, Bitcoin is open to all.

Silicon Valley knows a platform when it sees it, and is aflame with Bitcoin. Teams of brilliant young programmers, entranced by the opportunity, are working on Exchanges (Payward, Buttercoin, Vaurum), Futures Markets (ICBIT), Hardware Wallets (BitCoinCard, Trezor, etc), Payment Processors (bitpay.com), Banks, Escrow companies, Vaults, Mobile Wallets, Remittance Networks (bitinstant.com), Local Trading networks (localbitcoins.com), and more.

Looming over them is how governments view Bitcoin and the entrenched financial powers it threatens. The last few decades have seen a move towards a cashless society, where every transaction is tracked, reported, and controlled. Bitcoin takes powers from the central actors and returns it to merchants and consumers, savers and borrowers. Bitcoin brings back some pseudonymity in the transactions, and can be irrevocably traded like cash. And finally, it points a way towards a single currency – it is a bug, not a feature, that we have multiple global currencies with exchangers and transaction fees in between.

Governments have been cracking down on the bitcoin exchanges, making it harder to obtain and slowing its development. Strict and expensive Money Transmitter regulations, designed to slow terrorist and child porn financing, threaten the next great technological revolution – never mind that terrorists can use cash just fine, the means of terror are cheap, and that they account for an infinitesimal fraction of global commerce. The development and innovation in Bitcoin has already begun the move to friendlier jurisdictions, where its innovation can continue un-impeded. Regulators in the US and UK would be wise to proceed with a light touch, lest they push the development of Bitcoin and its entrepreneurs to places like Canada, Finland, and the Sino-sphere. The United States has benefited enormously from being home to the majority of global companies driving the Internet revolution. The country that is the home to the Internet of Money could one day end up as the guardian of the new Reserve Currency and the Global Money Supply.

Thanks to Shawn O'Connor, Lucas Ryan, Paul Bohm (@enkido), and Oleg Andreev (@oleganza) for feedback. Follow me at @naval

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A VENTURE SLA

There is an opportunity for a new VC Firm to brand itself. Recent brands in Venture Capital arose from transparency and founder-friendliness. YCombinator gives new, young, technical talent an entry into Silicon Valley. 500 Startups does it globally. Fred Wilson blogs the business. Marc Andreessen and Ben Horowitz back Founders to be Public Company CEOs. Ron Conway tirelessly connects his investments to his huge personal network. AngelList gives away investor and talent introductions for free. Founders Fund explicitly cashes out Founders. First Round Capital builds and operates an internal platform. Brad Feld, Mark Suster, Floodgate, Felicis, Freestyle, Softech, Harrison Metal, Baseline all have transparent, founder-friendly philosophies.

That's not how most VCs work. Imagine if a young entrepreneur were to walk into a VC firm and say:

“We help our customers but don’t tell them exactly how. Our core product is a commodity, yet we don’t disclose pricing. Even when we do, there are substantial hidden costs. It has to be bought in bulk, more than they want. We can take months to onboard a customer. We reject most of them but don’t actually give them a straight answer. They don’t get dedicated support. They don’t get to choose or replace their representative. We don’t commit to serve them in the future. We have hundreds of competitors with the same strategy. Now where’s my check?”

Not even the DMV could get away with this. It’s only possible when the supplier has power over the buyer. As companies get cheaper to build, that power is eroding. Most great VC firms know this, and have built reputations to counter much of the above. That’s what “smart money” means.

But there’s the opening. No one quantifies it or promises it. A few are beginning to – Passion Capital has a Termsheet in Plain English. The accelerators of course do this.

But where’s the venture capital with a strict, quantified promise? A Service Level Agreement?

Imagine this pitch:

“Hello, we’re Founder Friendly Capital. We

- Give you a quick and clear answer. 3 meetings, 2 weeks, yes or no.
- Sign up to a plain-English, Founder-Friendly Termsheet. We pay our own legal costs.
- 1x Liquidation Preference, no veto on Arms Length transactions. Four weeks to decide. No one-way NDAs.
- We’ll always do our pro-rata in the future or sell you back our stake.
- Will never bring in an outside CEO without at least 50% Founder consent.
- You’ll get access to the following resources. X hours of our recruiter time. Access to Y network. Office hours with your Partner.
- Board Seat above \$X, Board Observer below that, no Board Control
- No Option Pool Shuffle – the Pre-Money is the true Pre-Money
- Minimum investment amount is \$___; Minimum ownership percentage is __%
- Choose your Partner – don’t be embarrassed to ask

- 10% of the Round can be used for Founder Liquidity

...”

Change the numbers. Change the terms. It’s the transparency that matters. Instead of leaving every option open and wiggle room on everything, make hard choices up front. A Venture Capital Firm that voluntarily constrains itself will be viewed as Founder Friendly, Smart Money, and will never be short of opportunity.

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BUILD A TEAM THAT SHIPS

I started my first company 15 years go, and I still can't manage. I suspect that very few people can. With AngelList, we want a team of self-managing people who ship code.

Here's what we do:

If they can't ship, release them. Our environment is wrong for them. They should go find someplace where they can thrive. There's someplace for everyone.

It's not perfect. We ship too many features, many half-baked. The product is complex, with many blind alleys. It's hard to integrate non-engineers – they aren't valued.

But, we ship.

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WHY YOU CAN'T HIRE

There isn't a shortage of developers and designers. There's a surplus of founders.

The cost of starting a company has collapsed. It's now just (minimal) salaries. For entrepreneurs, desks are free, hosting is free, marketing is online, and company setup is cheap.

Raising the first \$25K for product development is easy – join an incubator. Raising the next \$100K is easy – investors are following the incubators with automatic notes. Building a product and launching a product are easy – develop on Open Source Stacks, host on Amazon, launch on Facebook, Android or iOS, get your early traction.*

Getting real traction is hard. Raising millions of dollars is hard. Building a sustainable, long-term company is hard.

Yammer can hire. Square can hire. Twitter can hire. These companies have achieved product / market fit. Your pre-traction company has not, and so it has a hard time hiring.

If the costs of founding a pre-traction company have gone down, then returns to pre-traction founders must go down.

Throw out the old cap tables. A founder doesn't get 30% and an early engineer shouldn't get 0.25%. Those are old numbers from when you had to raise VC capital before you could build a product. Before everyone could and did start a company.

Post-traction companies can use the old numbers – you can't. Your first two engineers? They're just late founders. Treat them as such. Expect as much.

Your next five designers and developers? Your cap table probably can't even afford them until you have traction, and the cash that follows it.

Close the equity gap, and hiring will get a lot easier.

* Of course nothing is ever “easy” – but it's a lot easier than it used to be.

** This is just my opinion, not that of my employer. But you can see what they're doing to help at AngelList Talent. Coincidentally, the lead hacker on that project put up this related must-read post on his own blog yesterday.

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TOWARDS A LITERATE NATION

“Give me a lever long enough, and a place to stand, and I will move the earth”

– Archimedes

To reduce unemployment, we need to lever up.

Not like Wall Street did, through debt, but like Silicon Valley does, with tools.

Leverage magnifies your actions and increases your productivity. You can get leverage through:

We're trying to help labor. We don't have much capital. We must give tools to the people.

All of the great modern tools for productivity – the printing press, the factory, the movie studio – require capital and coordination to use. The computer is the first tool since maybe the stone axe, that an individual can use to gain massive leverage, without permission from anyone else.

The modern computer can help in every endeavor – even if you don't use a computer at work, you'll soon carry a \$50 smartphone in your pocket. You're banking online, learning online, communicating online. The computer, and now the smartphone, make everyone more productive.

This is why Silicon Valley doesn't have enough people, when the rest of the nation doesn't have enough jobs.

Now computers are simpler. More ubiquitous. Cheaper. More accessible.

And we can teach people how to use computers, through computers, using tools like ShowMe, CodeAcademy, Bloc, and so on.

Let's create the world's first, completely Digitally Literate Society. Not a nation of programmers (maybe someday) but a nation of people who are comfortable with the most powerful tool ever invented by mankind.

Let's do it quickly – train them in three months from start to finish. And cheaply – for free.

We can create the program at Stanford, MIT, Berkeley, Harvard, etc. We can teach basic proficiency – use online applications like Google Apps, Search, DropBox, Email, Online Banking, Travel, Ordering supplies, etc. Some basic creation – create your own web-site. Research questions. Solve problems. Learn to learn.

Google, Amazon, and Apple will loan us the tablets. Companies will pay us to have people learn to use their apps. An app marketplace where companies pay society to educate society.

Apple, Square, DropBox, Twitter have created beautiful software interfaces. iPad and Android have made the hardware accessible. Today, it is not just cheap to build a company. It is cheap to re-build a person.

Let's create the world's first digitally literate society. The world's most desirable workforce. If that won't generate employment, nothing will.

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GOOGLE SHOULD PULL AN ANDROID ON FACEBOOK

Android's best weapon against iOS is that it's a much more open platform. iOS' elegant user experience comes at a cost – developers have to suffer through approval delays, rejections, private APIs, rules against advertising, and shutdowns. Android, on the other hand is open to carriers, users, and developers.

Facebook developers face two major problems. Firstly, to attract them, Facebook concocted and gave the developers access to artificial virality channels. Then, to prevent spam, they had to take them back. But the enforcement seems capricious and arbitrary to developers, with some (i.e., the offerwall providers) being punished, and some (check a certain game company's S-1) being rewarded. Secondly, Facebook is still figuring out its own business model, so what's allowed and what's not is subject to change – look at the graveyard of social ad companies and payments companies, and the recent introduction and mandates on Facebook credits.

Google should tell developers – “Here's a simple set of rules that will never change. Here's a simple API that we will always keep backward compatibility with. Here's an incentive and a reward for creating an application that brings more users into G+. Here's a simple and clear way for users to export their information and their social graph. Here's the standard small cut that we take on everything – it will never go up.”

Right now, the only true open platforms for any startup are email and the web. Android is a close third. Facebook, iOS, SMS, etc., while beautiful and elegant, forget at their peril that there was a time when AOL, Compuserve, WAP, and other walled gardens were beautiful and elegant too.

An army of 100,000 developers is Google's best chance against Facebook.

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THERE IS NO ANGEL BUBBLE. THERE ARE MANY ANGEL BUBBLES.

A common meme floating around right now is that there is an Angel investing bubble.

In the sense that an enormous amount of capital is being placed at risk, and its popping will have grave macro-economic consequences, No.

The total amount of additional capital flowing through the Silicon Valley early-stage ecosystem, thanks to Super-Angels and newly minted millionaires, is on the order of half-a-billion dollars or so. It's no more than a middling-sized VC fund. Would the emergence of a new VC fund be considered a bubble? Would the collapse of one signal disaster?

Furthermore, most of this capital is replacing traditional Series A deals. As we say around here, "Seed is the New Series A." The same companies that needed \$3M to launch now need \$30K-\$300K to launch. So, it's not surprising that there are many more of them.

Ok, but could that mean that the amount of capital for funding startups in the old environment is too much for the new environment? That the total supply of early-stage funding dollars should come down by a factor of ten rather than the number of companies being funded go up by a factor of ten?

This one is harder to ascertain, but my sense is that if there's too much capital, it's not an overwhelming overhang. Most of the small companies being funded will fail, but the ones that hit will generate fantastic returns. And because of their small size and operating costs, a greater percentage will be able to get "ramen profitable" than was traditionally possible. Of course, actual exits might still be rare. The volume of small M&A deals hasn't scaled with the volume of Angel investments in small companies. I think we're all going to have to become even more comfortable with failures, re-starts, and the kind of team re-combination that one sees from one Y Combinator Demo Day to the next.

One thing that has been happening is that Angel investment valuations have been climbing very quickly – un-sustainably so. Twenty companies in an Investors' portfolio carried at a valuation of X might now suddenly be twenty small bubbles at a valuation of 2x. They may not be able to clear their valuation in a micro-acquisition, or lead to a down-round in a VC financing, or just give a sub-par return for what might otherwise have been a hit. Prices on the margin *have* been rising, and that will hurt returns.

Prices have been rising not because of a huge influx of money (no big, macro bubble), but because of a modest influx of price-insensitive money. Prices get set on the margin. On Wall Street, it doesn't take an influx of \$5 Trillion into the stock market to move the total market capitalization of all of the companies from \$15 Trillion to \$20 Trillion. (In fact, money never moves into the stock market – it moves *through* the stock market, but that's another post). Rather, a small series of secondary transactions at the margin, done by price-insensitive buyers at high prices, can move the quotational value of each stock considerably higher. Similarly, a small number of high-profile Angel investments, moving small amounts of capital but at very high valuations, can make the entire market look overvalued.

So what's driving the new, price-insensitive bidders? It's three things:

1) VC Funds – Every VC that announces a \$20M seed fund is basically a price-insensitive Super-Angel. They're buying first looks and options to finance companies in the future, so they're not particularly price sensitive. When you have \$1B under management, \$20M is pocket change.

2) Entrepreneurs Set Pricing – Leaderless “party” rounds often end up with the entrepreneurs setting the valuation. And clever entrepreneurs are getting the less price sensitive investors to sign off on the initial terms, and then taking those terms, social proof in hand, to Investors who would have been traditionally more price sensitive.

3) New Angels – People who have had modest exits and are now angels are just building their portfolios. They don't have enough exits under their belts to understand that price does matter. Not as much as in other businesses, because a Power Law distribution here means that one winner can dominate your whole portfolio. But it still matters because a lower price allows you to pick more startups in the hope of finding that one winner. New angels often hear that “If it's the right company, price is irrelevant.” That's true, but that gives too much credence in your own ability to pick the right company. If you're informed just enough to know how un-informed you are, then you doubt your ability to consistently pick winners, and a low price will give you more attempts to figure it out.

So does this always end in tears?

For VCs, they will look back at these seed funds and find that (a) their seed efforts didn't have the best returns and that (b) they didn't always get the first look options that they always wanted. But it will probably still pay off. Seed is the new Series A, and if you don't do Seed, you're basically retreating to later stage.

For Angels who are price-disciplined, things will be fine – we are undergoing an incredible renaissance in technology, with smart phones taking computing to local arenas and social networks taking it into the mainstream populace. There's a lot of opportunity and great companies will be built. For un-disciplined Angels, there will be pain (unless they find their one big winner early), but it's part of the learning curve inherent in the business.

Entrepreneurs win big, all-around. There has been some concern that all of these small companies are going to get orphaned – who will fund them downstream? I don't necessarily view this as a negative, though. Even failed, these entrepreneurs are going to be much more employable than those who never tried or had the opportunity, and given that the minimum efficient scale of businesses is getting smaller and smaller, more of them will succeed than in any previous generation.

Entrepreneurs sticking to the old model of hiring are getting hurt. The old model used to be that after a Series A, you could hire an engineer and give him 0.25% of the company. Good luck hiring a great engineer for that in Silicon Valley now, for a freshly-minted startup with a small seed round in your pocket. The opportunity cost for that engineer is now to go join a Seed Combinator or raise some Angel funding. So, we're going to see the equity gap narrow between the founders of raw startups and early key team members. Only the best startups with high valuations and tremendous traction can recruit under the old formulas anymore.

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THE UNBUNDLING OF THE VENTURE CAPITAL INDUSTRY

People often mock Super-Angels as being impure because they invest other people's money. We also often get asked "What are VCs and Seed Funds doing on AngelList?" (They're clearly marked, by the way, and you can choose who your pitch is visible to.)

I will propose, however, that whose money you're investing is less relevant than on what terms it comes on. Venture Hacks was created to educate entrepreneurs when the Angel market was much less robust. At the time, if you wanted anything more than \$250K, you basically had to go to Venture Capital.

Venture Capital, at the time, was a bundle of three things – Advice, Control, and Money.

The money is obvious – you want money, you go get it. But in the case of VC, it came with control – because the amounts being disbursed were large enough, it made sense that they needed to be actively managed. And finally, because it was actively managed, you cared about how well it was managed, and thus the advice.

Now, thanks to increased dissemination of information on the web, Venture Hacks and many others (Series Seed, A VC, Feld Thoughts, The Funded, etc.) have helped entrepreneurs understand the control layer. Y Combinator and other seed incubators have essentially helped "union-ize" the startup workforce, and via reputation and standardized documents, reduce the control that VCs have over startups. Lower capital requirements have opened up the playing field of investors, and reduced the need or even the ability of early-stage investors to do active portfolio management.

So Angels are investors who leave out the control. They essentially bundle just Advice and Money.

The amount of money invested and whose money it is are factors that play into it, but most Super-Angels eschew control. Similarly, some seed funds (i.e., True Ventures), and some larger funds (i.e., Andreessen-Horowitz) make entrepreneur-friendliness a core part of their ethos, and as such often leave out classic control provisions (M&A vetos) or mechanisms (Board seats). Conversely, you'll see some Super-Angels or

even traditional angels asking for more control if they're investing a significant portion of their investable capital.

We are also seeing the emergence of Seed Combinators and Pure Money plays. Y Combinator, TechStars, I/O Ventures, AngelPad, Founder Institute, etc., are basically giving advice – if you're going there for the funding, then you're not doing the math. DST and later stage funds are pure sources of money.

The net effect is that the Venture Capital is slowly being un-bundled, as mature industries often are.

One side effect of all of this is that reputation matters a lot less. It used to be that VC reputation was built on their ability to pick winners (this has signaling value to other investors and potential employees), the advice that they gave, and how friendly they were to the entrepreneurs, given that they essentially had Board control. Most of this doesn't matter anymore – it's only the signaling and advice that carries much value for savvy entrepreneurs, and even the advice part is gradually being augmented and possibly replaced.

There is one thing that the new unbundled model can't replace – which is the subtle influence of incentives. You may be able to get advice from the best advisors, money from the cheapest source, and keep control for yourself, but the one thing that an experienced VC partner can **uniquely** provide you is someone who has a strong incentive (because they own a lot of your company), and a very different perspective and experience base. That's the old-fashioned "Investor as a Partner" model. It will always survive, to some extent, but it's not the model that any but the best firms practice.

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FUNDING MARKETS DEVELOP IN REVERSE

I co-founded AngelList because I was tired of saying no to entrepreneurs. I wanted to say instead, “yes, we can help you get funded.”

So, it’s especially disappointing when we get promising startups pitching on AngelList from remote locations. Some we’ve managed to get funded – including ones in Canada and Europe. Others are harder – especially in Russia, Latin America, and Asia.

The problem, as I’ve come to realize, is that funding markets develop in reverse.

In any given geographic region, the first companies that get funded are the ones that least need funding. They have strong operating histories, auditable financials, predictable cash flows, etc.. Funding these companies is less risky, and so a secondary, and then a primary, market forms around them. Call these the public markets.

After the public markets come the mezzanine investors, investing just before a company goes public. And because the mezzanines now exist to pick up risk, late stage private investors start forming behind them. And so on and so forth until you end up with Seed incubators and Angel investors.

Essentially, the single biggest risk that you have as an investor is “downstream financing risk.” The risk that the company won’t be able to raise more money once it has spent all of your cash.

This explains the apparent paradox that in less mature innovation cities, you’ll have an easier time finding VCs who will invest \$10M in a mature business, than Angels who’ll invest \$100K in a raw startup.

It’s a measure of the incredible strength of the Silicon Valley ecosystem that Y Combinator has chosen it as its hometown. YC and its brethren can only exist because of the rich Angel ecosystem. Paul Graham was smart enough to realize that his graduates couldn’t function without a rich Angel ecosystem, and went to great pains (such as AngelConf) to foster it.

Similarly, the true evidence that the NY Angel market has finally blossomed is that TechStars and a number of other seed combinators are choosing to do business there.

As an entrepreneur choosing your base of operations, take a careful look around. If you don’t see many VCs, you’re not likely to find many Angels either. Even though the VCs invest more money, they actually take less risk.

Similarly, Angels should realize how this whole pyramid functions. Investing in companies that won’t have access to Venture is incredibly risky. Investing at Venture valuations in Angel-stage companies means that your portfolio will likely generate negative returns.

Finally, if you are one of these talented entrepreneurs in a “frontier” location where there aren’t enough angels around, you have two choices. You’re either going to have to bootstrap to the point that you can show real financial returns, which will attract local and foreign investors. Or, you should consider relocating your headquarters (although not necessarily the whole company) to a funding hub.

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PRIVACY VIOLATIONS

All sorts of businesses are being built by violating assumptions about the privacy of data.

Flickr violated the assumption that you wanted your photos private by default. Before Flickr came along, the default photo sharing model, espoused by Shutterfly, Snapfish etc., was that of private photo sharing.

LinkedIn violates the assumption that your resumé is private.

FourSquare violates the assumption that your location is private.

Twitter violates the assumption that some of your thoughts are private.

Instagr.am violates the assumption that your mobile photos are private.

Blippy is testing the assumption that some of your financial transactions are private.

All of these services take your original notion and need for privacy, and trade them off against your need for fame and recognition.

What's next?

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INTERVIEW ON ENTREPRENEURSHIP UP AT GIGAOM TV

Check out the full article, and watch the video.

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WHY (PRIVATE) INVESTORS ARE HERD ANIMALS

It's a common complaint – venture investors are driven by what other investors think, and therefore lack imagination and spine.

There's some truth to it – it is human nature, after all, to look for social proof and authority when making decisions. However, that's not the whole story.

In public markets, Investors make their decisions to invest in parallel, and in theory, most of the relevant information about a company is publicly disclosed, by law. Businesses are also much more mature, and therefore easier to value. Finally, the market is very liquid and very deep, so there isn't much uncertainty about the supply of money available and availability of money in the future.

In a public market, it's unlikely that I have access to private data about a company's prospects, and if I do, I buy or sell the stock and move the price. Your ability to act on my knowledge is zero – by the time you learn about it, it will already be built into the price.

By contrast, in private markets, there is a lot more non-public information scattered across many individuals, and they have the luxury of deciding in series. Businesses are brand new and immature, and very difficult to value. The market is shallow and illiquid, and a “Keynesian Beauty Contest” means that you want to finance a company now just because it is likely to be financed in the future.

Therefore, when you see other investors piling into a company, you can infer: – They probably know something about the company or the market that you don't, given that a lot of the information (quality of founders, state of competition, true size of market, etc.) is private and scattered across many minds

– This company is more likely to get financed in the future, since it seems able to attract many, high quality investors (the aforementioned Keynesian Beauty Contest)

– And you *still have time to act at the same price* on this new information

That last fact more than any other causes Investors to move in herds.

It is rational for private investors to move in herds. They have the strong incentive – limited and diffuse knowledge. More importantly, they have the means – financings in which the price doesn't change as the investors decide in series.

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WHO HAS TIME FOR MEETINGS?

A lot of entrepreneurs assume that the initial way to engage with an investor is to **insist** on a meeting. It's a relatively safe assumption that anyone on the buy side (an investor, an advertiser, an executive at a large company) receives far more requests for meetings than they can follow up on, and are constantly looking for excuses to say "no."

Synchronous activities, such as phone calls, screencasts, videos, and webex conferences are almost as bad. If you're trying to get the attention of an investor or exec at a major company, and don't want to waste either your time or their time, pay very, very close attention to the cost of their time and you'll fare better. In order of escalation, one should proceed as follows:

– Introduction – have your introducer send them an email **without putting you in the to or cc line.** That way, if the target does not wish to engage, you haven't put them in the awkward position of having to supply an excuse or a turndown. The introducer protects their ability to be taken seriously this way.

– Once you have a response / interest, send something written for them to look over and offer a phone call, webex, or meeting as next steps. Written always beats a video or screencast, since most intelligent people can read a lot faster than they can listen. A webex demo is a crutch – if your product has to be explained, it probably isn't ready for the average consumer. And if it's in beta, you should at least know how to open up a password-protected demo version.

– If the target displays interest in learning more, then you can move to a call or in-person meeting.

People who insist on a webex demo or in-person meeting at the outset are forcing the target to make a high-cost decision, and are subtly signaling that they don't value their own time, and certainly don't value the targets' time. They might think that they are demonstrating persistence, but one wants to see persistence in chasing the product, not in chasing dead-ends.

In short, your high-value targets don't have time for meetings between un-screened parties, and since you're busy building a company, you shouldn't have time for them either.

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VENTURE HACKS MEETUP AND PANEL AT SXSW

For those of you going to SXSW, I'll be on the Seed Combinators Panel on Monday March 15 3:30pm. I'm joining Paul Graham, David Cohen, Marc Nathan, and Joshua Baer to talk about YStars, TechCombinators, SeedBoxes, and the like. Here's the Plancast if you want me to "count you in."

I'm also throwing a meetup on Sunday March 14 5-7pm in the Four Seasons Lobby Lounge at 98 San Jacinto Blvd.

If you're a Venture Hacker, please come talk to me about your startup and venture hacking at these two events. I'm looking forward to pressing the flesh and kissing some babies.

Please RSVP on Facebook xor Plancast so we can get a headcount. Gracias.

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DOCVERSE AND MIXER LABS EXIT STAGE RIGHT

Congratulations to portfolio companies DocVerse (now at Google) and Mixer Labs (now at Twitter). The best part was getting to know and work with people that I genuinely liked and now consider friends.

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SELF-PROMOTION

BusinessWeek includes me on a “Smart Money” list. Thanks guys!

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THE IPAD IS IMPORTANT

Perhaps not in this incarnation – remember the first iPod? But the concept is very, very important for two reasons:

– It's the first computing device that's social in the real world. The iPhone is something that one person uses at a time. The Laptop screen faces you – two people using it at one time is awkward. iPad style devices can be shared in the real world – imagine laying it flat and playing multiplayer games facing each other, or watching a movie together, or even showing someone a web page – far easier than on any other device.

– It runs the iPhone OS. Why do users need to know what a file system is? Or map the interactions of a moving block of plastic onto a screen (mice)? Or worry about memory management? Or multiple levels of trash-delete? Or the concept of multiple, mounted volumes? Or which network you're connected to?

Basically, the iPad is (a) usable by the other 5.5 Billion humans, and (b) it can enhance real, physical human interactions. These two facts alone make it a worthy successor to the iPod and iPhone. Steve isn't ready to start filling niche markets just yet. He's still looking to rule the world.

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Y COMBINATOR VS. GRADUATE SCHOOL

Y Combinator* is the new Graduate School.

In some ways, it's better:

- You pay to go to graduate school. YC pays you.
- After school, you get a job. After YC, you create jobs.
- You repeat the works of the greats in school. YC expects you to do original work.
- In school, you are graded on an arbitrary scale by arbitrary people. After YC, you are graded by the real world.

Some day, most schools in most disciplines will be like this.

* – Of course, “Y Combinator” is a generic term for Techstars, I/O Ventures, SeedCamp, Capital Factory, Founders Institute, and all of the other similar pre-angel incubators.

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WHY YOU NEED TO BE IN SILICON VALLEY

For years I didn't believe this. I thought that you could take advantage of the benefits of Boston, Seattle, NY, Austin – cheaper talent, no echo chamber, local Universities, etc.. But I give up. I found myself telling an entrepreneur why he had to be in Silicon Valley if he wanted to succeed. Most of my points are about Consumer Internet businesses...

I won't belabor the obvious reasons – the Investors are here, the best engineers and entrepreneurs self-select and come here, Stanford and Berkeley, yadda yadda.

Instead, here are some points that you may not have considered:

- Especially on the Consumer Internet, modern businesses are becoming winner-take-all (thanks to leverage and network effects). Therefore, if you're 10% better than the competition, you win, likely the whole market. You need every possible edge...

- All of the companies that you need to partner with are out here. Business development doesn't happen in formal meetings. It happens in informal coffees, parties, and relationships.

- If you are here, your network will be using all of the latest tools – Twitter, Foursquare, Quora, Nexus One, etc., before other networks in other cities will. These networks hit critical mass here earlier and are thus more valuable to the early adopters here. You'll have a 3-month+ head start on people outside to see what's coming next. Imagine trying to design next year's clothing without firsthand immersion in this year's fashion, in Milan or Paris.

Sure, it's possible to build a great Consumer Internet business starting out somewhere else, but given that these are winner-take-all businesses, do you want to start out that far behind the curve?

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LIVE APPEARANCE

More of a warning so you know where not to go, I suppose...

I'll be on a panel at the "Future of Funding" event in San Mateo on February 18th.

More information here:

The Growth of Small Firms

February 18, 2010

11:00-12:00pm

Description: There are an increasing number of venture capital firms with smaller and smaller fund sizes. These firms are starting to see some interesting returns, while remaining popular with entrepreneurs.

What is working? What is not? This panel will explore how some of the small firms are investing and looking for big wins.

Fellow Panelists:

- Moderator: Matt Marshall, CEO and Editor, VentureBeat
- Mike Maples Jr., Managing Partner, Maples Investments
- Rob Hayes, Partner, First Round Capital
- Reid Hoffman, Partner, Greylock Partners

If you'd like to attend and if we know each other, please contact me and I might be able to obtain a discounted pass for you.

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HOW TO PICK A CO-FOUNDER (AT VENTURE HACKS)

I have a new post on picking a co-founder, up here:

<http://venturehacks.com/articles/pick-cofounder>

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THE RETURNS TO ENTREPRENEURSHIP

I was at dinner the other night with a group of entrepreneurs. One told the story of a 27-year-old whiz kid whose company will likely exit for \$500M – \$1B – the business now being less than two years old. You can imagine the effect that this had on the brilliant, hardworking 35+ entrepreneurs in the group, who have had their share of hits, but not at that magnitude and not that quickly.

These stories are getting more commonplace. It seems that the entrepreneurs who “hit” these days are doing it more quickly, making more money, and doing it at a younger age. Back in the 70s, it took a decade plus to build a company and \$10M, even in today’s dollars, was a big victory for an individual. Up until the late 90s dot-com boom, even though these stories existed, they were less common and took longer.

The storyteller explained that this 27-year-old is more brilliant and more hard-working than the previous entrepreneurs he’s seen.

That can’t be it. There are only so many hours in the day, and the entrepreneurs of yesteryear worked just as hard as the entrepreneurs of today. And the ones who came before were just as brilliant. Human intelligence has not evolved that dramatically in 10-20 years.

Rather, I posit that the amount of leverage available to a modern Internet entrepreneur is far, far greater than was available to entrepreneurs of previous generations. The number of entrants has dramatically increased as well. The overall hit rate might be lower, but the ones who win, win bigger and faster thanks to the leverage.

Gone are server farms, telesales and support, marcom material, tradeshow booths, direct sales forces, licensed software, mountains of code, reseller agreements, plane tickets, hotel rooms, printing CDs, voicemail systems, and so on and so forth.

Modern Internet entrepreneurship starts with a few engineers working for nothing and carrying laptops and cellphones. They coordinate with Skype and GTalk and wikis and bug tracking systems. The company itself is snapped together with outsourced HR, cookie-cutter incorporation, and outsourced finance / payroll. Marketing is done virally, or through SEO, or SEM. Customer service is handled via the community and forums. PR and outreach through tweets and blogging. Payments come via Paypal. Ads are served up by third-party ad networks. Storage goes on Amazon. Computation scales via Amazon, Softlayer or Rackspace. Code is built upon stacks of open source, SaaS, and \$10/month services.

What used to cost \$1M-\$2M to set up, now costs \$10K. What used to cost \$5M to build, now costs \$250K. What used to cost \$20M to go to market now costs \$1M.

But the upside hasn't gone down. It has gone *up.* The 3 billionth person will be online shortly. They can all use the product. Network effects are stronger than ever, and some businesses become natural monopolies very quickly. Most web products have no marginal cost of replication, so adding a new customer is pure profit.

Less labor required. Less capital required. Less cost to scale. Larger markets. Cheaper marketing. No cost to ship more product.

No, people aren't getting any smarter or harder-working. But the amount of leverage is obscene. The hits – Yahoo!, eBay, Google, Skype, MySpace, YouTube, Facebook, Twitter, Zynga, are each arriving faster than the previous one did. And the leverage is increasing, not decreasing.

The returns to scale for being smart, young, skilled, and high-energy have gone up tremendously, and that has profound implications for society. The smart are getting richer.

Update: An insightful comment on Hacker News: Basically, the Internet is a wide and deep place. The depth creates a few huge winners and the breadth creates a large number of small winners (who would have been losers in the old system, but due to the above-mentioned low costs, can still win). What's missing is the traditionally fat middle. We've gone from a normally distributed set of outcomes, to a power-law distribution. The median is a small fraction of the mean. This is bad news for anyone who has built their business predicated on their achieving mean outcomes. That includes mid-stage VC funds, moderately-capitalized companies (traditionally speaking), and societies that care about "equal" outcomes.

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EXTRAPOLATING COMPUTING

Remember when mainframes did all of the computing? And workstations were dumb terminals docked to the mainframes? The terminals had less power, but were more “mobile.”

Then everyone got a desktop. And the desktop is where you did most of your computing. And you carried around your underpowered laptop, which had to be synced with your desktop, or docked to a big screen, keyboard and mouse to be usable. The laptop had less power, but it was more mobile than the desktop.

Now most early adopters have a laptop as their main computer. And are carrying around their underpowered smartphone, which has to be synced with their laptop on a regular basis. The smartphone has less power, but well, it’s more mobile.

We’ll dock our smartphones to our laptops for a while. But, if we can extrapolate from the history of computing, the laptop is headed for the dustbin.

Which means that Apple will be ok. Google will be ok. But if Windows Mobile is any indicator, Microsoft is in deep, deep trouble.

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THE FOUNDATIONS OF COOPERATION

“The foundation of cooperation is not really trust, but the durability of the relationship.” – Robert Axelrod

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MENCKEN ON POLITICS

“The whole aim of practical politics is to keep the populace alarmed (and hence clamorous to be led to safety) by menacing it with an endless series of hobgoblins, all of them imaginary. ” –H. L. Mencken

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NEW BLOG AND FEED ADDRESS

Please update your RSS readers to my new Feed address:

<http://feeds.naval.mystagingwebsite.com/startupboy>

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USERS BRING YOU TRAFFIC

Duh.

But how?

I only know of four viable methods:

If you don't have one of these four methods in operation, and you're building a web-based company, you're going to find yourself begging for traffic a lot.

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CHARLIE MUNGER ON GETTING AHEAD

We get these questions a lot from the enterprising young. It's a very intelligent question: You look at some old guy who's rich and you ask,

"How can I become like you, except faster?";

Spend each day trying to be a little wiser than you were when you woke up. Discharge your duties faithfully and well. Step by step you get ahead, but not necessarily in fast spurts. But you build discipline by preparing for fast spurts... Slug it out one inch at a time, day by day, at the end of the day – if you live long enough – most people get what they deserve.

– Charlie Munger

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WARREN BUFFETT ON EFFORT AND VALUE

Out of school I offered to work for [Benjamin] Graham for free and he said I was overpriced.

– Warren Buffett

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SAMUEL ADAMS ON FREEDOM

If you love wealth more than liberty, the tranquility of servitude better than the animating contest of freedom, depart from us in peace. We ask not your counsel nor your arms. Crouch down and lick the hand that feeds you. May your chains rest lightly upon you and may posterity forget that you were our countrymen.

– Samuel Adams

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KEYNES ON THE CURRENCY

There is no subtler, surer means of overturning the existing basis of society than to debauch the currency. The process engages all the hidden forces of economic law on the side of destruction, and it does it in a manner which not one man in a million is able to diagnose.

— John Maynard Keynes

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TUMBLR CUSTOMER SERVICE BLOWS ME AWAY

When's the last time that you had an accurate, timely, thorough, and polite response to an email to a free service?

——Original Message——

Date: Sat, 16 Feb 2008 14:05:25 -0800

To: support@tumblr.com

Subject: Migrating from squarespace

>I'm abandoning my squarespace blog and moving to Tumblr. I have my own

>custom domain. My old RSS feed is at:

>

><http://www.naval.mystagingwebsite.com/journal/rss.xml>

>

>How do I set my tumblr RSS feed to be at the same address! I don't

>want to lose all of my subscribers in the move... Can I map the domain

>to tumblr and then set the feed URL from somewhere inside Tumblr? Can

>I use a third-party service like Feedburner to do it?

>

>Thanks,

>

>Naval

>

Hi, Naval. Tumblr doesn't allow the creation of a custom RSS feed address. You might try burning your Tumblr feed in FeedBurner, using FeedBurner's MyBrand feature to associate the burned feed with your custom domain, and then editing the Custom HTML of your Tumblr theme to point browsers/RSS readers to the RSS feed from FeedBurner MyBrand rather than to Tumblr's default RSS feed.

I know MyBrand will let you keep <http://www.naval.mystagingwebsite.com> in your feed address. I'm not sure if it will let you keep [/journal/rss.xml](http://www.naval.mystagingwebsite.com/journal/rss.xml). You'd have to experiment or ask the FeedBurner folks.

Info from FeedBurner:

<http://www.feedburner.com/fb/a/publishers/mybrand>

Sorry that I can't be of more help on this issue. Please let me know if there's anything else I can help you with. Thanks for using Tumblr!