

**Mohnish Pabrai's Lecture at the University of California, Irvine (UCI) on
May 24, 2016**

Yang: Okay. All right. Tonight we are fortunate to have Mohnish Pabrai as a guest lecturer here at UC Irvine Merage School of Business. To introduce him, I want to touch on three things; First, he's the managing partner of Pabrai Investment Funds, which today manages over \$500 million. A \$100,000 investment in Pabrai Investment Funds at its inception in 1999 would be worth 889,000 at the end of 2015. By comparison, the same amount invested in the Dow Jones with dividends reinvested would be 234,000. Second, in 2014, he founded and raise \$150 million for Dhandho Holdings. Dhandho Holdings is an insurance-focused holding company. Its primary strategy is to acquire private companies. Last but not least, he's the founder of the Dakshana Foundation. It takes a metrics-driven approach to providing world-class educational opportunities to gifted, but impoverished children worldwide. Please join me in welcoming Monish Pabrai.

Mohnish: Thank you. Well, it's a pleasure to be here and actually quite an honor. My family and I moved to Irvine in 2003. I have a couple of lectures a year, and a couple of business schools. One is in New York and the other is in Delhi. It's very nice to have a shorter commute. It did take 13 years to get here. But thank you Professor Yang for making that happen. I'd also like to say that very few enlightened business schools have anything in terms of either coursework or professors who focus on value investing. From that vantage point, I think it's wonderful to see that UC Irvine is in that genre. It's a very small group. I think Professor Yang may have something to do with that. Let's give him a round of applause. Thank you for making that happen. I haven't given this talk before so to some extent you are the guinea pigs. Thank you for being the guinea pigs. It's somewhat different from a lot of other talks I've given. I've always felt that the best way to learn is to teach. Quite frankly one of the big reasons I wanted to put this together was to actually educate myself. I got quite an education in putting the talk together. I think I'll get a little bit more of an education in the interaction today.

That'll be great. The focus of the talk is to appeal to a few different audiences. One is, if you were considering a career as an investment manager or an investment analyst, I think the talk would help you figure out whether that is the path you ought to go down. Even if you have some assets and some savings and are trying to figure out how to invest those, I think the talk will add some value on that front as well. Most of the material I'm going to present is plagiarized because I have no original ideas. You'll soon learn that. I'm actually going to be channeling a guy named Peter

Kaufman and another guy named Charlie Munger, and a little bit of Warren Buffett thrown in.

Peter is the author of Poor Charlie's Almanack. Some of you might be familiar with that. It's a wonderful book. I think it's one of my favorite books. He's very close friends with Charlie Munger. I think he once told Charlie Munger, "Charlie, you and Warren have been successful for three reasons. Do you know what those three reasons are?" Charlie told him, "No, Peter, why don't you enlighten me?" Peter said, "Well, the three reasons you guys have been so successful is that first, you're willing to be extremely patient. You guys are not in a hurry to do anything. The second is that you are willing to be very decisive. When opportunity presents itself, you don't hesitate to act".

Munger has referred to this as a man with a spear standing there waiting for a salmon to go by. He's got the spear ready and he's perfectly happy waiting there for hours. Then, a big juicy salmon goes by and he spears it. Extreme patience coupled with extreme decisiveness. The third trait is having no concerns about being different from the crowd. Doing whatever they feel makes sense regardless of how the world looks at it. They don't really care about what people might say if they do something. What Peter said is that you really have to kind of unpack that a little bit. When he says being patient, it's not about being in agony while being patient.

It's being in bliss while being patient. It should be a natural trait for you to be happy to watch paint dry. If you're the kind of person who loves to watch paint dry then the investing business is a very good one for you. The decisiveness, again, shouldn't make you break out in sweats, but when you see so often, Charlie says that for each of us, the opportunities that would truly make us wealthy are not going to come around every week. They'll come around so often, and they come around at unpredictable times. But when they do come around and when you do recognize it you need to act very significantly and very quickly. That again is a second thing that many people have issues with, where they'll recognize something and then make a 2% bet.

That also is a second trait. Then the third one about being different, this is probably the hardest one for humans. Humans are averse to stepping away from the crowd. Having no concerns about how people think about you based on what actions you take is a very important trait as having no stress about it. Each of you can evaluate that for yourself in terms of whether those are, do the gloves fit, if you will, or do the gloves fit with those traits? To some extent, I think there must be, at least most of it needs to be inborn. I think it would be a little bit difficult to take a high-speed trader and convert them into a model like that. You need to have a natural bias towards that in your personality.

Then, the other piece is, how do you make investments? How do you know something's a great idea or not? I thought what I'd do is, I'd take the example of, one investment that Warren Buffett and Charlie Munger made which was the investment in Coca-Cola. I wanted to go through the models they used when they made this investment. There was no spreadsheet ever created when they did the Coke investment from then till today. It's been about almost 30 years since they made the investment. They have no analysts or associates or anyone who helps them. I don't even believe they made much in terms of notes when they made the investment. But they thought very deeply about it.

For most investments, if you can't do the math in your head then it should be an automatic pass. There was no DCF model run for Coco. There were no numbers-based models. I mean, they had some numbers in their mind, but I don't think they ever reduced them to paper. But they did have I think, and I may be missing some of them, but there were dozens upon dozens of models that they used in making the investment. What happens is that when you have an overlay between models that's when you get what Charlie Munger calls Lollapalooza effects, one plus one becomes 11. It's really kind of the interplay between the models that lead to kind of the aha moment and such.

Charlie Munger had given a speech to a group that basically elected to be secret. They told him not to disclose the name of the group that he gave that speech to. After he gave the speech where part of the speech covered the Coke investment, they told him it was a useless speech and they didn't appreciate it. I actually think it's one of his more brilliant speeches, and actually it gives you a window into how they think. I think it's useful. Anyway the Coke investment that Berkshire Hathaway made was between 1988 and 1990, about a three-year period when they bought the stock. At that time, they invested about 1.3 billion into Coke, and 1.3 billion at that time was approximately one fourth of the book value of Berkshire Hathaway.

They made a very significant bet. I mean, you'd think of an insurance company taking one fourth of their equity into a single stock, and that's what they did at the time. The last bit of Coke that Warren bought in 1990 was bought at about 25 times trailing earnings. It wasn't cheap by traditional metrics that you might use. But on many fronts, they are considered a no brainer. Obviously, they've now not touch that position for almost like 30 years. I don't think they're going to touch that position even well after Warren and Charlie are gone from the scene. I don't think the composition's going to get touched at Berkshire for a very long time. Why do they make the investment? What went through their minds to make the investment? One of the things that Warren and Charlie have said is that if they had not invested in See's Candies, they would've never, ever invested in Coke. To understand the

Coke investment, we should go back to the See's Candies investment, because that'll give us some clues. In 1972, they bought See's Candies, and how many of you are customers of See's? Have you ever had See's candies?

How many of you have never had See's candies? We have a few unfortunate humans. Maybe you can next time you're going through some airport, get some peanut butter brittle, that might be a good start. But anyway, they bought See's in '72, and in '72, they bought See's for 25 million. The deal almost didn't happen because the family that was selling wanted 30 million for the company, and Warren was already choking at 25 million. He thought the \$25 million price was really rich. The reason why Warren thought 25 million was rich was because See's at the time was generating about 2 million a year in cash flow. They had 8 million in netbook value, and the purchase price was 25 million. They were paying more than three times book value for the business. When the family said they wanted 30 million, Warren just said that 2500000 in one cent, I'm out of here.

You can either take the 25 million or we'll walk. They're very grateful that the family didn't walk and sold them the business for 25 million. 12 years later, in 1984, See's was earning 13 million. In '72, when they bought it, it was making 2 million. In '84, 12 years later, it was making 13 million. The book value had gone from 8 million to 20 million. The unit volume over that 12-year period had only gone up by about 2% a year on average. If you look at the See's Candies purchase from 1972 and take it all the way till today, the unit volume growth of See's has been about approximately 2%. Number of pounds of candy they sell every year has gone up about 2% a year over the last, let's say, 45 years, or 44 years or so.

But their earnings have gone up significantly more than that. It's a private company, they don't disclose the numbers. I would guess that See's is probably approaching a hundred million, maybe somewhere in the 70 to a hundred million, maybe more than that in terms of earnings per year at this point. California GDP from '72 till now has grown up as probably 5 or 6% a year. See's did not keep up with California GDP growth over that period from a volume growth perspective. In fact, even the 2% volume growth that has come in with square footage increase. Their retail space went up by approximately that number which led to that growth. Warren and Charlie say that the river of cash that came out of See's funded a zillion other things at Berkshire.

If you asked them today, "what is the value of See's to Berkshire?" They probably couldn't even tell you, but it would be in the tens of billions. It would be very significant in terms of what it did. If you were to ask them today that, Charlie says that we were barely smart enough in 1972 to buy See's, barely smart enough, because he says that, if the family didn't budge to our stupid demand of 25 million,

we would've walked. Actually, if you go backwards and think about it, they could have paid a hundred million for that business, and it would've been a low price based on what happened after that. It was a phenomenal business. The only thing Warren did, the only input he provided to management is they kept the same management.

Chuck Hogan has kept running the company. The only thing he did was, he said that on January 1st of every year, I will send you the new price list. He took over pricing for the company, all their peanut butter or brittle, and all their fudge pricing and everything else. Beginning of the year, Warren would look at, inflation is 3%, let's bump all the prices by 12%. Year after year, what he found is that they could raise prices significantly above the rate of inflation, and it didn't have any negative impact on sales. Sales just kept going. But they also found out a few other things. They got a huge education in brands and branding, and that education in brands and branding was very fundamental to the Coke purchase. See's is a California phenomena.

People in California, if I had the same talk going on at Columbia University or something and asked the same question, they'd looked at me like I was from Mars. Never heard of See's except for the few that had gone to Omaha. They repeatedly tried, and Warren and Charlie occasionally would try to nudge management to expand See's into other geographies. Every time they tried to expand other geographies, they would fall flat on their face. I think one time they had a store in Chicago, but it never worked. They've opened stores in several geographies. It's never worked. But slow expansion in California has worked. They found that the brand had certain brand value in California. They also found that people were willing to pay a premium for See's candies in California.

But that same cache didn't follow through in other locations. When the Coke idea came in front of them, there were a couple of things that were different about Coke from See's. The first thing was that Coke traveled really well, and they could see that. They had repeatedly tried to take this brand into even the neighboring states but they couldn't do that. There are only two countries today in the world where you cannot get Coke. North Korea is one of them. I forget what's the second?

Speaker: Cuba.

Mohnish: Pardon?

Speaker: Cuba.

Mohnish: Yeah, Cuba. That's right. Cuba and North Korea are only two countries where you cannot get Coke today. But what they noticed is that even in these two countries, if

Coke tomorrow started selling in these countries with no advertising, it would take off in quite a significant way because that brand has meaning even to people who have never drunk Coke before and never seen an ad because, so much part of pop culture and movies and whatnot, that it's entrenched.

Basically, what they found is that unlike See's, Coke traveled really well, and Warren studied this phenomenon of the difficulty of traveling with See's very carefully, because he was very interested in making See's global. He would've loved for See's to become a global company. With all the brain power they had, they could never do that. But here was a company that was naturally a global company. The second thing he noticed that was different between See's and Coke, he's been drinking five Cokes a day since he was six years old. Coke has been a regular part of his diet for like 80 years or something. The second thing he noticed was that there was a limit to the amount of fudge you could eat. As you eat more fudge or See's candies, your ability to eat more of it declines. But with Coke, the lack of an aftertaste means that the ability to consume Coke was quite significantly higher than the ability to consume candy. In fact, a person couldn't consume five or six Cokes a day pretty much for their whole lives without really feeling like they were having something monotonous. Many of us do that. How many of you have one or more Coke products daily?

No one admits to having Cokes. Actually you're having other Coke products. You just don't recognize that they're made by the company. They've got like over a hundred brands. The second thing they recognize was that unlike fudge and peanut butter, brittle and peanut brittle, Coke had no after taste. The volume you could consume and the frequency with which you consume it was quite different. In fact, even if you compare it to something like McDonald's, which is a very good model, but if you were eating at McDonald's every day that could probably get to you much faster than consuming Cokes every day. They noticed that this particular product has this nuance of recurring consumption, not really being an issue in terms of purchase.

These were some of the models that they knew about before they started to research Coke. The third thing they also recognized differently between See's and Coke was, with See's you needed retail space. They had to have a See's store and pay rent and all these things to celebrate. Coke got sold in all these places where the company didn't pay any rent. It was just sold all over the place. I'll go through a little more details about the kind of the capital light model of Coke. There were a number of reasons why Coke was very far more capital efficient than even See's was. Even though See's in 84 was producing 13 million on 20 million invested capital, I mean, that's a very high return.

65% return on invested capital is a really good business, Coke was even better than that. It was a truly remarkable business. Then the second part of the mental models that come in is that, Warren and Charlie like to go through long histories of these companies that they study. With Coke, both of them read every annual report since the company was public. They read every annual report from 1919, which is when Coke went public until the late eighties, every single annual report. They got some insights from reading those annual reports. One of the insights they got was that from the period of 1919 to let's say 87, there had never been a year when Coke's unit or cases sold was lower than the previous year.

Through the Great Depression, through the Second World War, through the Korean War, through all the stagflation of the seventies, through all of that unit case volume, just every single year went up over the previous year, nonstop. The second thing that they noticed was that Coke, which started in Rome, Georgia went through this major international expansion. They were repeatedly over the years they were first only in the Southern US then they kind of spread out through the US and then Canada, and then they started spreading out. In fact, World War II took them to all the places where the US Army went. They saw the whole way Coke entered one new country after another, and what happened after they entered the country. They could see that from the reading of those reports.

What they concluded was that the runway was really long. I'll get through the runway. The way they defined the runway from reading Coke is that humans need to ingest water to survive, right? We need to ingest about 64 ounces of water a day to survive, and humans prefer to consume flavored water over plain water. At least some portion of that 64 ounces they prefer to consume flavored versus plain. In fact, Warren's daughter says that she's never, ever seen her dad drink water. She says she's never seen her dad drink a bottle of water or drink a glass of water. That never happened. Warren, I think about 40 ounces a day is coming from Coke. I don't know where the other 24 ounces are coming from, but she says water is not part of the deal.

If you take the 64 ounces that humans have to drink, they figured that at infinity, you'd probably get to something like, 50% of that volume gets consumed in one way or another in a flavored format. You can take that today, where if you look at something like Dasani, which is a Coke brand for water as part of that, some kind of bottled kind of beverage becomes about half of it. They felt that Coke could probably take 50% of the flavored portion. 16 ounces per day per person, which is two servings. They just looked at the unit volume, they looked at the number of servings, they looked at the number of humans, and they looked at that runway, and they said that we've got a long way to go here.

You've got basically this distribution engine where you can pump a lot of brands through it, minute maid and monster and all these things. World population was growing. As world population grew, Coke consumption would grow. GDP was growing in countries where GDP is very low. If you look at a country like Mexico, for example, the per capita Coke consumption in Mexico is the highest in the world. It's above the US. There are other countries in the world where they're at 100th of Mexico's volume. Coke would grow as it went in new countries, it would grow as GDP grew, it would grow as per capita consumption grew. That was another part of what they learned from reading those annual reports.

Then Warren read this Fortune article, which was written in 1938 about Coke. The writer of the Fortune article said that, this is a marvelous company in 1938, has done so well. Then he said, well, of course the ride's over because the company went public in 1919 at \$40 a share. Now that is worth 3,300 per share if you go back to the Strawbridge and all that. The writer of that article said it's great to know that, but the ride's over. Warren says, the ride was not over because if in 1938 you invested a fresh \$40 into Coke, by 1993 it was 25,000. You could have missed the first 20 years, and you still had runway after that.

Another model they used was they didn't have an anchoring bias. A lot of times in investing, what happens, and in fact I'm very guilty of that, is we tend to look at kind of past performance of a security. That taints the way we look at it, and actually, what you really ought to do is ignore the past, just focus on the future. They were really good at not having this bias about, hey, this company's been growing from 1884 till a hundred plus years. Now we want to invest in it. A hundred years after this company got formed, we are putting one fourth of our capital in. Have we lost it? They didn't think about it that way. Some of the other things they realized is that the company was currency proof.

It was asteroid-proof. It was thermonuclear blast-proof. It was anarchy-proof. It was pretty much a bulletproof of any way you look at it. If you think about a situation where you have, let's say an early extension level event take place, right? Let's say asteroid comes in, and let's say the asteroid takes out six and a half out of the 7 billion humans. Let's say we left with a few hundred million. Well, the Coca-Cola Company has the trademark, and they have the formula and they will eventually start producing coke again, they will probably get back into business and such. You could not say that about almost any other business when you have that sort of an event take place. Even if currencies changed or got devalued or whatever happened Warren's perspective was that people would be willing to trade two minutes of labor for a Coke.

The trading of labor versus Coke would be independent of currency. That was another part of the model. The notion that our mouths are a very personal space, right? There's a few spaces humans are very sensitive about. Mouth is one of them. We are kind of sensitive about what we put into our mouths. If you see a Coke and you've had it in the past, etc., you won't think twice. Even if you're in a different country, you'll have no problem. But if you see some kind of unknown brand, it's kind of like, you eat Wrigley's chewing gum, and then someone presents to you Glotz's chewing gum and says, would you like some? You're probably not going to take it.

Our mouth is a very personal space, and we are not going to be messing around. We are trying to take the low bid on what goes into our mouth. They felt that we are creatures of habit. Once we get these habits formed, they may not be willing to change them, especially with personal spaces like our mouth. The second is about humans are creatures of habit. Like we shave every day on the same side of the face first, or in the case of ladies the same leg first. We do things in a certain pattern. Again, once we get to those habits and patterns, we are reluctant to make those changes. They saw all these things, and they saw all of this was kind of coming together from the reading of the annual reports, and then they looked at the, I have already probably gone through maybe 20 or 30 different models they used.

We still have a lot more to go. There's a lot of more models they went through. But in all the models that I've gone through with you, we haven't talked about any numbers. I went through all this stuff about it being a great investment. We haven't talked about numbers. Now I'll just go through some numbers, but none of these numbers need a spreadsheet. They're kind of very simplistic numbers. The way the Coke model works is the Coca-Cola Company produces concentrate and syrup. Let's go back to the point where there's just one product, which is Coca-Cola. We won't go through a hundred brands they have right now, but let's say there's only one product Coca-Cola, they produce concentrate and syrup, The syrup gets sold to bottlers around the world, and the bottlers then produce the Coke cans and bottles that you see in supermarkets and everywhere else.

The Coke company also sells the syrup to various fountain operators. Like Burger King, McDonald's and so on, where you can buy fountain drinks. There are two models, right? There's the bottling model, and then there's the fountain model, and let's say a restaurant and such. The way the bottling model works is, the Coca-Cola Company does not set the price of a bottle of Coke. It lets the bottler do that. They can pretty much set whatever price they want. What it does is, it sets the price for the syrup. Just like Warren did on January 1st with See's candies, they bumped the price of the syrup nonstop and has been doing it for a hundred years. The simple

economics is that if you have a can of Coke on sale at Costco or wherever, you might get it for about 25 cents, 12 ounce can.

The 25 cents, the Coca-Cola Company gets around 6 cents, 6 or 7 cents of that comes to the Coca-Cola Company for the syrup. The rest of the cents, let's say, 18 cents or so is shared between the retail outlet that sells it and the bottling operation that produces it. The bottlers is where a large amount of the CapEx is happening. Because they've got all these bottling plants, they've got all these trucks, they've got drivers, they've got all the distribution going on. The Coca-Cola Company just needs a few plants around the world to produce syrup. The number of people they need to do that. When Warren and Charlie want to make the investment, the Coca-Cola Company had 17,000 employees. All the bottlers had half a million, so the CapEx is on the bottlers. This is See's candies on steroids because you don't have any retail, it's kind of reminded me one time I was visiting Microsoft I think this was like probably 15 years ago.

They used to sell their operating system to, for example, Dell. Dell would install windows on all the machines. I was talking to one of the Microsoft engineers, I said, "do you guys send the CDs to Dell?" When you buy the computer, you get the CDs and such, they said "no", or the floppy disc? They said "no". He said, we give them one copy and then everything else is their cost. Microsoft wasn't even willing to spend the money on the disc even that they dumped on the PC makers. It was even better than the syrup business. At least Coke has to provide syrup. In the case of Microsoft, they just provided the bits once, and then they charged you on the bits, which is why it's such a beautiful model. Mr. Gates is the wealthiest person on the planet.

It's very funny, like he looked at me like I was dumb-as-a-doorknob. Like, "what do you mean I'm going to send them CDs? No, I'm not going to send them CDs. I'm going to give them one copy". Then he told me that once it got to streaming, we didn't even send them a copy, we just streamed it to them. They are not going to send them a single copy. In the case of Coke, it's not like Microsoft. They still had to sell the syrup, but what they did is they came up with one more enhancement where they got to concentrate. The syrup patch sugar in it. What they did it and it had water, and what's the point of shipping these heavy things.

They actually improve the model to just giving concentrate and telling the bottler, "Add so much sugar and add so much water, and how you got the syrup". They even took it down one level further. You take the 25 cent can, the Coca-Cola Company gets about 7 cents. The cost on that is basically next to nothing. It's sugared water. They're not even paying for the sugar. They spend about 10% of that on advertising, and approximately about 25% or 30% of that number is pre-tax

profits. That's basically their model on the bottling side. Now, when you get to the fountain side, things get even more exciting. When you go to a restaurant and you ask for a Coke, they don't charge you 25 cents. What do they charge you, Alex?

Alex: Well, because I'm a senior citizen, I might get a discount, so I will say couple of bucks.

Mohnish: Couple of bucks. Yeah. That 8 or 12 ounce serving is now 12 bucks. The Coca-Cola Company is giving it to the restaurant at probably 15 cents or something. They are very benevolent, and they let the restaurant make a lot of money on the Cokes. What happens in that format is the restaurant loves Coke, it is the highest margin product of anything they're going to sell. People want it, and people ask for it by brand name, etc., like, the ones that don't offer Coke and they have Pepsi, they have to ask, would you like a Pepsi instead? You kind of say, "oh, okay, it's fine. I'll take the Pepsi, take a bullet for the team".

The fountain sales model, if you think of the ecosystem, everyone makes money. The restaurant makes a lot of money. The restaurant's very happy. The bottler that converts the concentrate to a syrup makes money. They're very happy because they deliver it. They do the last mile stuff, and the Coca-Cola Company is obviously very happy. Both these models work really well. Just to give you kind of a sense of the CapEx differential, before they made the investment, these numbers have gone up quite a bit since then, but in scale, they're correct. All the bottlers were spending in the mid-eighties, about 1.3 billion in CapEx every year. The Coca-Cola Company is spending 160 million, approximately like 12% of what the bottlers were spending.

Most of the benefit of all of this went to the Coca-Cola company. Warren was obsessed over the fact that there was Branson had started Virgin Cola, and then there was Sam's Choice, and there were all these kind of private-label type Colas, and they study there and the bottom line is that none of those ever got any traction. Why didn't they get traction? Well, number one, the personal space, the mouth, you're not quite sure about Sam's Choice, even though you like Sam Walton. The second is the economics. They can't really undercut. If you think about a 25 cent can, the reason it's a 25 cents is because of global scale. This is a global company selling at a huge volume.

I mean, they're buying aluminum at a huge volume, all those things, right? You try being even with whatever volumes Walmart has, and then you try to get customers to not buy Coke and buy Sam's Choice. How much can you undercut Coke? They've got about 2 cents that they're making on that 25 cents as profit. The bottler is probably making another couple of cents. You got about 4 cents. If you had the

exact same cost as a Coca-Cola Company, if you were at 21 cents and Coke was charging 25 cents, you would make no money. If you didn't discount versus Coke, who would buy Sam's Choice? How many of you consume Sam's Choice? Does it even exist anymore? I've been to Walmart lately. The Sam's Choice exists. (Alex, you haven't kept up, no, all right) But in Costco, I don't remember, maybe you guys know, because I don't, does Costco have a generic Cola? Do they sell? No, I don't think so, right? Do they have?

Mohnish: Oh, is that the store brand?

Speaker: Cheaper, yeah.

Speaker: Yeah. That's in like Albertsons.

Speaker: That's Albertsons.

Mohnish: Yeah. So, they've got some private label, but they've got the big containers.

Speaker: Yeah.

Mohnish: Okay. Who drinks refresh? Is it cheaper?

Speaker: No.

Mohnish: Do they have a Cola?

Speaker: I think they wanted to.

Mohnish: Okay, all right. You see that. What they found is that if a competitor tried to come in and the store tried to do a private label or whatever else, they really couldn't undercut them because the economics just wouldn't allow it. This is some of the things they understood about Coke when they read those annual reports. Now, we get to another set of mental models, which is the mental models on branding. The Coca-Cola Company, basically now, the market cap of Coke is about 190 billion. I'm guessing they're probably 17 times or something.

I think they're probably making like 12 billion or 13 billion or something in after tax profits. The Coca-Cola Company has always spent less than 10% of their revenue on branding. One of the things about the branding is, when you see a can of Coke, the can of Coke is actually branding, right? Because it's all got the Coke brand and everything. Who's paid for that? It's the bottler. Is that part of the 10% that the Coca-Cola Company spends? No. That Coke can is completely paid for by the bottler. Those red trucks you see paid by the bottler, right? That's also not part of Coke branding. Those are all things that are, so every single case and can and

stuff the fountain displays and all that is all kind of continuous branding going on without them spending a dime. Others are spending the money on that.

When Warren invested in the Coca-Cola Company, they were spending less than a billion a year on branding at the time. He said that if you gave me a hundred billion and told me to take away the market leadership of Coke, I would just return the hundred billion to you. It couldn't be done. Even though they had spent, so it had been a hundred years, it had grown, they were spending less than a billion, a decade or two before that. The unusual thing about branding is that when things get etched in our brains like Coca-Cola is etched in our brains, it has this kind of multiyear effect. What Coca-Cola spends in 2016 on branding is not exhausted in 2016.

It has residual effects even 50 years from now. When you have a business that's been added for a hundred years or more, that brand just keeps getting more and more popular. One of the things and another of the mental models is that red and yellow are primary colors for humans. We get attracted to red and yellow more than anything else. That's so that when I look at logos and they use a color red and yellow, like McDonald's, makes great use of red and yellow. Wells Fargo does great use. Especially logos that have those primary colors, I think they have more of an impact long term than the non-primary colors. Basically, one of the things about Coke is that, this brand has got itself so deeply etched into our psyche after all these decades and more than a century that the cumulative effect of everything they've done in the last hundred years exceeds what they've spent in the last a hundred years in terms of brand value. It significantly exceeds that.

Warren felt that for a hundred billion you couldn't take away the leadership of Coke. At the time they were investing in Coke the market cap was less than 20 billion. Actually, I think probably less than, yeah, I think they maybe 15 billion or something was the market cap. They had a huge amount that they could get. The other thing about Coke is that, (we'll finally turn on PowerPoint. Sorry to talk so long). The other thing about Coke is that these are some scenes from different restaurants in India, in the middle of nowhere, actually, they're not in any cities or anything. If you see that top restaurant there, it's called Prakash Dhaba that's in the middle of nowhere in India. You see all Coke signage everywhere.

Here's how that happens. The Coke bottler goes and meets the restaurant owner and says, listen, do you want to paint job? You need furniture and all for free? He says, "oh, yeah, of course, furniture's great. The furniture's going to be red. You see all the red furniture; the one table is probably what they had before. The second is he says, "do you want us to put your business name on the top?" He said, "yeah, sure". What they do is, you see on the left that Prakash Dhaba name is a little bit there,

and the rest is all Coke, right? Here's the funny thing, the restaurant owner loves that. Why does he love that?

He loves that because people trust him. He's got a trusted brand. Now they think, "oh, you know, this place, it can't be so bad, we can get our cokes and we can get all the other food and all that". It's what Munger would call "the association tendency". What happens here is, the Coca-Cola Company gives some matching funds to the bottler, and they tell the bottler, "listen, go paint the town red". Literally paint the town red, and we'll give you a little bit, kind of a change. You see that the second picture on the left is the inside, not the same restaurant, different restaurant. I think that guy's only an outdoor place. Here same thing, we'll give you a paint job and, all the furniture's red and everything's red, and the guy's probably very happy about it and such.

Basically, the thing is that these types of signs and these types of insignia you would see them deep in rural China, very deep in rural China. You'd see this in the middle of nowhere. I mean, the penetration is way beyond the cities and all of that. It is gone deep into the hinterlands. That distribution all the way down at that level is extremely powerful. When you look at this brand even though the company spends less than 10%, the actual amount of impact it has is just massive. It's just huge. One time I interviewed a guy and he worked for Coke in Atlanta. He had lived with them all over the world. He was originally from Morocco, and he was part of the team that managed the World Cup relationship for Coke with FIFA. That was his whole job, football, and not only him, and probably 30 other guys at Coke.

I'll get into this a little bit later, but the association tendency of being at places where humans are happy. The FIFA relationship with Coke and all the global sponsorships, the Olympics, so these are, Disney, all of these places, McDonald's where people are generally happy, Coke wants to be there, right? They've got the etching of this brand over the decades in all these places all over the world is huge, right? Then we get to the managers. Coke had such an incredible model, this is a company that just produces fountains of cash.

There's just gushes of cash. You just can't lose money. You just send the syrup and you're getting massive. What the company did over the years is generally speaking, what happens is that when you have businesses with great business models you end up with dumb managers who do dumb things, because even when they do dumb things, they look really good because the business is so good. Coke would put their money into buying shrimp farms in Thailand and all these unrelated businesses, and almost everything they bought was a far worse business than the core business that they had. In 1981, two guys came on the scene Roberto Goizueta became the CEO Cuban guy, and then Donald Keough became under him the president. There were

some unusual people in the history of Coke going by the decades but Goizueta was a very unusual guy.

He was really good at marketing and branding, he understood this model really well. He was really good at finance, understood capital allocation really well, It's very unusual to have a number guy with a branding guy put together. Keough was just a great operator. What they did in when they came on the scene in 81 is they started dumping all the other businesses. They got rid of everything that Coke owned which was not related to beverages. The only thing they bought was they bought Paramount Pictures in 81. Then they realized what, five, six years later that even that was dumped and on 87 or 80 they dumped Paramount Picture. What Warren saw was from 1981 till his first purchase in 88, in seven years, with these two guys, finally this was a company that had real capital allocators.

What they were doing is aggressively buying back the stock. What the Coca-Cola Company started doing was they had this gush of cash coming in, the dividend was going on. It's the one of the only companies that for 50 years I think more than 50 years now, has raised a dividend every single year. I think there's no other company in the NYC that's done that if some that have maintained it, but they've raised dividends every single year. The first thing they did was they cut out and got rid of all the crappy businesses then sold them. The second is, they started aggressively buying back stock. Basically, they took their cash flows and Goizueta was brilliant. Warren, I think saw what was going on with Roberto Goizueta and Don Keough coupled with all the other stuff I just told you.

Now you finally had a business which had management that got it. That's why they went in and Roberto Goizueta himself owned two and a half percent of Coke. He actually had a significant economic interest and went from there. Now the thing is, many of you are skeptical because of the whole sugar issue, right? Like, if I ask you to drink Coke, most people say no, because I don't drink sugar, right? They actually addressed that this year at the annual meeting. Warren says that, he's 86 years old in great health, he has been consuming five Cokes a day, Cherry Cokes since he was six years old. He dismisses all these health issues people bring up with sugar and whatnot. He says that he wishes he had an identical twin brother who spent his whole life eating broccoli.

He said, "if I had this identical twin who would just drink broccoli and plain water, then we'd have a test. We would see him at 86, and we'd see me at 86, and we'd see who was healthier" Basically, his perspective was that. I think he talked about it as a joke, but then Munger actually elaborated, he said, It is very dumb to discuss negatives about a product without discussing the positives. One of the things we have to realize as humans is that; yes, excess sugar has problems, it causes health

issues and whatnot, but having a Coke at certain times will add a lift to your step. That lift to your step is very difficult to quantify. I think this is the reason why Warren says he wishes he has a twin brother.

Because the thing is, that guy lives such a happy life on all fronts that I think science doesn't fully understand the impact of low stress and happiness on health. There's an impact there, which we don't fully realize, but I'm pretty sure it's there. Yes, if you go wild and crazy and have huge amounts of sugar consumption, and then that leads to health issues, there's a problem. But you can be Usain Bolt drinking two Cokes a day and be just fine, so they don't see the sugar issue being a significant issue for Coke. The second issue with Coke is they now have more than a hundred brands, a large number of their brands including Coke, have no sugar, and a large number of them even have no carbonation.

When you get to these places, they're not pumping Coke over there, they're pumping Coke, they're pumping Dasani, they're pumping Minute Maid, they're pumping all kinds of products through that distribution engine. It's not just sugar being pumped through, it's a sugar. The other thing about the company is just to tell you how Coke has made a lot of blunders over the years. One of the blunders they made is that they never wanted the Coca-Cola product to have anything but the true Coke product in it. When there was a concern about sugar, and people were talking about diet drinks, they did not want to create Diet Coke, and they did not want to call it Diet Coke, and they didn't want to take that beautiful bottle and the red color and mess with it. They didn't want to do that.

What they did is they called that product tab, okay? How many of you heard of Tab? Some of you, I see the older guys have heard of Tab, and for the longest time, Tab was this stepchild, and then Tab became Diet Coke. Eventually they realized that we can put the Coke bottle with the diet without the sugar and might still work, and it worked. They got to it. Then we are getting to finally the part about what I call the Glotz's section. How many of you read the Glotz's paper, I think some of the folks have read it, right? That was a speech which Munger gave when they told him it was useless.

Munger kind of inverts logic. He says, "how do you create a \$2 trillion company with a \$2 million investment?" How do you create that? The way he does it is he says, "look let's go in 150 years. He says, in 150 years, how do we take 2 million to 2 trillion?" He says, 150 years, 2034 which is 150 years from when Coke is formed. He says that if there are 7 billion humans and they're consuming the 64 ounces, and then half of it is flavored, then one half of the flavored comes to Coke, and we are getting about 2 cents of serving, let's say by then, with inflation, we're

getting about 4 cents of serving. You run on the numbers that Coca-Cola at that point is making about 117 billion a year in profit, which would give you a market cap of 2 trillion.

He says, “that's how we get to 2 trillion”. He says that “what are the things we do to create that 2 trillion?” He says, first of all, this guy Glotz, who is setting up the Coca-Cola Company, doesn't want to call it Glotz's flavored sugared water. He wants to call it Coca-Cola because he likes that name better. He creates a name, and he does a lot of stuff to promote the name. The second is, he says, in 1884, consumption of sugar and caffeine is well accepted in society. We have coffee, tea, lemonade. We use sugar and caffeine because people like that. Using sugar and caffeine, we're going to create this product, and not just the sugar and caffeine, what we'll do is we'll give it a color, like the color of wine to make it look kind of high end, and we'll give it carbonation to make it like champagne.

We'll put the sugar, caffeine and the color of wine and carbonate it, and now we've got a great product, and then we sell it really cheap so that everyone can buy it. Then he said, “No, we have a choice. Do we create a beverage that's hot like coffee or tea or beverage that's cold?” He said, “well, cold beverages can be consumed in a much higher volume than hot beverages”. When you are kind of near the aquaria and it's really hot, you can have an almost unlimited ability to consume cold beverages. He says, “it's a no brainer you go with cold”. He says, you go with cold. Then he says, now we go into the mental models of the way human brains are screwed up.

He says, the first is the association tendency, which is, put it in places where people are happy, because when people are happy and they see coke, then they associate happiness with Coke. Then we finally get to our next slide, which is my favorite slide, the Marilyn slide, right? The association tendency is, if Marilyn's drinking it, then definitely I want to be drinking it too, right? The association tendency, what Coke did in all its ads for the longest time, and even now, is they associated with celebrities. In India, they'll pick some of the top Bollywood actresses, and the same thing here. They'll put these people in because the association tendency human's kind of do very well with that. The social proof tendency of humans is another mental model, which is, ‘monkey see monkey do’, that is, when we see other people drinking coke, we want to drink Coke too.

Show people having a good time with Coke and all of that. Then he says, do it both ways. Do it with fountains and do it with bottles. Then he says, another thing we would do with the Glotz beverage company is that we would basically create this aura around secrecy. People think there's something unusual about Coke because the formula is secret, it's in a vault in a bank. Quite frankly, the secrecy means

nothing, because he says that eventually with food science going where the way it was going, everyone would figure out how to make something close to Coca-Cola, but by the time they figured it out, we would have had brand and other things come in, which would help us kind of keep the competition at bay.

He says, the food chemistry that helps our competitors make a product like ours also helps us by reducing the unit costs. Like they went in the US from sugar to fructose, which was a lot cheaper, and they just made their whole, all their efficiencies in how they got there. Then he goes to Jacobi Inversion, which is, what not to do, what are the things that you don't do to get to the 2 trillion? He says, the first thing that you don't do is avoid losing half the brand name. The Coca-Cola brand name has two parts the Coca and the Cola, right? He says, don't lose either part of it. If anyone came up with anything called Cola, sue up and take them out. He said that in an ideal world, he would have made sure there was no other cola, they could call it whatever else, Glotz bottled water or whatever, or carbonate water, whatever, but no cola, right?

That's the first thing he'd say. You wouldn't lose half your brand name. You would avoid envy by basically having a standard great product at a great price, which they did. Then the final thing he said is that, don't change the flavor, even if someone comes up with something better, keep the flavor, because it's not about the flavor, it's about the brand. That brings us to the Cola wars, which very few of you are familiar with. How many of you are familiar with the Pepsi Challenge? Yeah, that's the usual cast of characters except you... How do you know about the Pepsi challenge?

Speaker: I read a lot of media.

Mohnish: Okay, all right, good. Some of us lived through the Pepsi Challenge. Did you take the Pepsi Challenge? All right, there you go. Basically, Pepsi had a problem, in the mid-eighties they had a problem. They knew that people preferred Coke by a huge margin and to Pepsi by like a two to one margin. They knew that their brand was inferior. If Burger King offered Pepsi and not Coke, then people would not think of Burger King as well. Every way they had to discount stuff and all these things was really hard for them.

John Sculley, before he went to Apple, he became the one who went to Apple and then ousted three jobs. Before he went to Apple, John Sculley was the Chief Marketing Officer of Pepsi. He was brilliant. He said, how do I take out Coke? He said, the way I take out Coke is I take away the brand name. The way I take away the brand name is I ask consumers to do a blind taste test. In a blind taste test where

if you put in front of someone a Coke and a Pepsi, they'd go for the Coke because of all that conditioning for the decades.

But now, if you take with a brand and you just give those tasting cups and then have them taste it, well, Pepsi is sweeter. It's actually taste better, right? In the blind taste test, people will say, oh, I prefer this one. Then they show you that it was Pepsi, right? They started taking market share, and Coke got rattled. Goizueta and Keough, who were part of Coke at that time got freaked out. They said, basically these guys have figured out that our product is inferior. What they did is they came out with new Coke, and new Coke was sweeter, and it was better than Pepsi. There was a major uproar. All the die-hard Coke guys were horrified that how can you change the formula? I mean, it's all about the formula. I want Coke. I don't want new Coke. There was this huge fiasco that now they had messed with the family crown jewels. They took away the one thing that was there, which was that secret formula and all the things about the secret formula. In reality, Coke had changed its formula many times, but they never told the public that they changed the formula. They just did it quietly. This was very visible. They called it new Coke, and there was a huge backlash. The the Coca-Cola Company realized that they screwed up. Then they introduced classic Coke and then there was new Coke and classic coke. You remember that? We had both, right? This was even more confusing.

Then they finally realized, we got to kill this whole thing, go back to just Coke. That's what they did. They went back to only Coke, and they survived that. What Munger says is that, look, this essay I wrote about taking 2 million to 2 trillion, he said, in reality, the company started in 1884, and by 1896, 12 years after they started, they had no earnings, and they had 150,000 in total assets. Much less than 2 million they started with. He says they lost half their brand name. They were not able to protect the Cola part of the brand name. They lost that, and they also screwed up with the envy of Pepsi, and they went to New Coke and all of that. They did all these mistakes, and they also had what they did, I think in 1900, they didn't think bottling was going to be that big. They thought bottling is kind of a side show.

They signed these agreements with these bottlers, which fixed the price of syrup permanently into the future. Like in 1900, they said, we'll give you syrup at whatever cents per pound for the next 100 years fixed price. It completely destroys the model because then sugar went sky high and they started losing money. Then they are telling the bottlers, we can't give it to you. They said, no, you have a contract. They had to battle the bottlers, and finally, they got some leeway from that. They made that mistake. Then what they had done is the bottling rights, what they had done originally, when they gave bottling right, it was a day's horse ride. The way they set it up was that they looked at how far a horse could go in a day

and a back, and that's how they defined the territory of a bottler. Okay. That didn't make sense once you got to automobiles. First, they had very big territories because Coke started expanding. They wanted to reduce those territories; the bottlers didn't want to give that up.

The second is that they had many useless bottlers, right? I mean, this is the license to print money. You got a monopoly in an area, you got the Coke product, and it's going to sell. You don't need to be that great a businessman. They had to really kind of go through a lot of work where they brought back a lot of bottlers and did all kinds of things to get their model back. But despite all that, Coke from 1884 till now with all the dividends they've given out, their market cap is huge, which Munger too gave in his speech that the market cap was 125 million in 1996. He said, If Coke's market value grows by about seven and a half percent a year, you will get to 2 trillion from 96 to 2034. If you go today, of course 96, I think it was inflated multiple. If you go to today, Coke is at 190 billion to get to 2 trillion in about 2034, you would need to be at about 14 and a half percent a year. I am not sure about that. But the other thing that could happen by that time is since we get these cycles in stock markets, you might have a 30 multiple on the company. Coke was sitting at a 40 multiple in 1999. There is a chance you might get some crazy multiple at that time and that might get you to the 2 trillion. Basically what I wanted to just say is that you can see the work that Warren and Charlie did. Usually, the thing is, One, they get a little bit of information edge because they are willing to dig deep. They are willing to read a lot and whatnot which most people aren't willing to do. The second where they get a lot of advantage is the synthesis. When they read, what are they kind of extracting out that model? The third is that they understand that when you have multiple models into playing with each other, I mean, when you put a great manager like Goizueta on top of a great business you just get phenomenal returns. I mean, those are just exceptional in terms of what ends up happening is great business with a great manager. Then when you get to some of these other nuances about personal space and all these other things about brand and such you get to kind of these [inaudible][1:14:04] effects. In the investment business, I think that this is the holy grail, this is kind of when you get to this level of analysis on a business you got it, and then you got it there. The key is to make very few bets and make very infrequent bets. When seven moons line up, you bet big and sergeant rest of time don't do much. With that, we will open up for any questions or comments you guys have.

Student: I will ask the first question, thanks very much for talking about the Coke example. One of the things I was wondering about those, you talked about how Coke is great business, right? You talked about a lot of the qualities that make the product very good and also the structure of the company. How do we think about how much the

company is worth though? Even the great business is not worth infinite? How do we go from what is a good business to whether that is a good stock to purchase.

Mohnish: Right, Munger gives us the answer. He says in 1996 going forward, 38 years that the value of the business is 16 times the current value plus all the dividends. He tells you that the way they got to the value of the business was they just looked at, unit volume and humans and market share and did some math on that. Then, the question you ask yourself is how real is that and the reality is quite frankly, from the point he made the speech till now, it is quite real. I mean, the sense that the unit volumes have continued to go up. Coke has continued to increase and expand its brands. They have got a lot of stuff now, which is non-sugar, non-carbonated, using that distribution engine and the distribution engine is very expensive to recreate. If someone comes up with a drink like Monster, for example for them to replicate what Coke has is very uphill. I mean, it is a huge undertaking. You are better off selling to a Coke, even at a high multiple. For a Coke, even if they pay 50 times multiple for a company that they think has global potential, they will get that very quickly because the volume growth, pumping it through their system. Having that distribution channel gives them a huge edge. You would have to have some change along the lines of humans not consuming liquids or something along those lines, which I mean, all businesses have issues. You can't get to Bulletproof, but I would say Coke, I think gets as close to Bulletproof as you can get. It is probably one of the... and I think that is why Warren put a quarter of the pie into it.

Student: I know that you mentioned as a value investor, you make very infrequent bets. When you really go in big, could you give us a little insight into what is your daily life like? Obviously you are not buying and selling every day, do you constantly just think about stuff, analyze new companies. What do you do on a daily basis kind of as a value investor?

Mohnish: Well, I think you would do well as a value investor if you enjoy reading and enjoy spending time with yourself. Those are good traits. While human contact is good, I enjoy those things. A few years back, I was having dinner with Charlie Munger and he had mentioned that he would love to see long histories of General Motors, and he said he thought that would be a great class to teach, I said, well, you can, you can see long histories of the business in something like value Line. He said, "No, that is not what I am talking about". He said, "I want a hundred year history of GM, and I want a hundred years of numbers for GM, so where can I get that?" I wasn't sure where he can get that. but recently some kids at Boston University I was talking to them. I was actually doing analysis of American Express, and they said, Oh, yeah, they had annual reports from 1950 on Amex. I just asked them, Hey can you get old reports of General Motors and they said, yeah, we can get all the reports from the beginning. They sent me a Dropbox file which had every GM annual

report, I think from like 1911 onwards. I emailed Charlie's assistant. I said, "hey, you know, Charlie mentioned this to me a few years ago. I have the reports if you want some, I will send you the link to them". She said he is very excited to receive them. Then I sent her the Dropbox link and then she wrote back, this was just before the Berkshire meeting, and then she wrote back saying that I have been instructed to finish printing them before we leave Omaha. It was like 24,000 pages, it is a lot of pages. She said, "I am busy printing", and this was on a Tuesday, I think normally Charlie leaves Omaha on a Thursday, and I saw him in Omaha on Friday. When I saw him on Friday, I said did you start reading the GM reports? Then he goes into this whole thing about the nature of the company and all the things in the early years and this and that, and he was plowing through them. Then I met him again after that. He was picking up insights into GM. I don't think they are looking at making investment GM or anything like that. I think this is pure curiosity to understand how the world works, right and so I said, Okay, let us do this myself. Let us start myself reading GM reports from 1911 to see if what insights can be gleaned because I had never done that. I have never picked up the 1919 Coke report, for example. I started reading General Motors, and I actually got through to the fifties. Now, I have gone through from 1911 to the early fifties, and my God, it was fascinating because I think the thing is that it is like asteroids coming in, but they don't know it because it is like 1928 and everything looks great, and then, the crash comes, and even that crash is nothing because in 1932, from 1929, 1932 really crash, and then even that is nothing because all through the thirties you are going through really tough times. Then like in 1941, 1942, the companies were informed by the US government not to produce any passenger cars. From 1942 to end of the war, GM is producing zero cars. They are producing airplanes and all kinds of things of the military, but no cars. Then you get to 1946, and the country has not had a single new automobile produced for like four years. This is just an amazing history. Of course, you can see the revenues and the cash flows and the brands are being built and all the different, they introduce the automatic transmission and all of that. I actually gained a lot of appreciation that you get a much deeper, richer insight into these businesses with some of that reading, you can also get some of the same insights from reading biographies or autobiographies. Like I am sure Warren and Charlie read Goizueta's book, I would love to buy a World of Coke and then the previous guys at Coke had written several books on Coke. You could go back and look at the history of the company through those biographies and such as well. I think that if you can set your life up in a manner which gives you large chunks of time to do reading, but reading not from the context of, I am going to make an investment reading from the context of just getting better at knowing how the world works. Then I think what I find with Charlie is that, when you look at recently, like the Valiant Saga, some of you might be familiar with Valiant, and I

don't think Charlie's ever read annual report by Valiant. I mean, he sits on a board of a hospital, but a lot of people sit on hospital boards of access to different aspects of the healthcare industry. But he had insights about Valiant that a lot of hedge fund guys didn't have. They had armies of people doing research on it. You get to wisdom, which is different from just being smart. I think that is what it gives you, it gives you a certain wisdom. If you are starting at your age and sounds like you have already started, which is good then you can start building up some advantage over your peers over the years.

Student: Hello. My question is what is your biggest mistake as an investor?

Mohnish: There are a lot of mistakes. I think the mistakes are kind of part of the landscape, and hopefully they teach us a few things. I am trying to figure out exactly how to answer your question in terms of, if I think about it in terms of percentage of net worth that got lost or net worth of the funds and such, I would say probably the biggest mistake was in 2008 or so where we had investment in a mortgage company, Delta Financial, and it went bankrupt. We lost 60 odd million which is about 10% of what we managed. It is expensive, but you learn lessons from that. I think that is a big one. I think that in the late nineties, 99 early 2000, I had actually started a private company. It was called Digital Disruptor that we did some partnerships with brick-and-mortar companies to bring out kind of dot com variance of those companies. That didn't go anywhere, I personally lost about 2 million, which was quite a bit of the net worth at the time. I had outside investors that lost about 3 million. But we actually did really well. That mistake took place in late 99 and early 2000. But those mistakes actually at that time helped us do really well in Pabrai Investment funds in the early years because we were able to sidestep a lot of stuff just because of the learning. I think every time, what I have found is that when there are mistakes if you just look at them carefully they are actually blessings because they are going to actually make you better and help you get better. John Templeton, great investor, used to say that you are going to be wrong in investing one out of three times, one third of the time you are going to be wrong. I think he is right. Sometimes you could be wrong where you don't lose money, you might flatline and such, sometimes you might even make money when you are wrong. But usually that is the case. I think even in the case of Warren and Charlie, if you look at their record they have large numbers of mistakes in their record, even though you can see how bright they are, what has happened with them, which has been really good is that they have been right on the large ones. But if you look at the sheer number of investments, there would be a large number of investments they have made, which didn't go the way they wanted to go. Some large ones actually they were able to save like Gen Re was a mistake. They were able to kind of salvage that. I think the thing is, it is very difficult in the investment business to avoid

mistakes. I think you are going to make mistakes. The key is to keep learning and getting better. Over time, even with the one third error rate, because one third won't mean that you are going to go south on one third, you might lose something there. You will end up with probably a better than average record if you keep at it.

Student: Yeah, thank you for the talk. We can see that you learn a lot from Warren Buffett and Charlie Munger and it is not easy to build up the business humans throughout the years. My question is if you are going to decide whether to invest in company that is totally new to you, what will be the first features you will look?

Mohnish: Well, I would say that it is a very good idea to consider indexing. One of the things or one of the reasons I wanted to give this talk is that I think it is not easy to be a weekend investor. If you think about, for example, the work that they did on Coke. It is a lot of work. It is a lot of work to read a hundred years of annual reports. For the large number of investors index investing will do quite well for them. There is nothing wrong with that. That is perfectly fine. I think that if it is a good idea to study a business for the sake of studying it, it is not a good idea to study the business of, just purely from the perspective was, do I want to invest in this or not and one of the things that happens is that there is, humans have commitment bias. What happens is that when we spend a lot of time on something, we feel we should get some return for that time and so it is a little bit of, I would say, a danger if you say that I am going to research a company and then decide whether I want to invest or not. I think you are better off just researching the company with no such preconceived notion because as you go deeper into the business you are spending more time and then you are feeling like, Well, if I don't do anything, what is the point and so on. I think that maintaining the objectivity is important and just not being compelled to act. My younger daughter's in the room, I will repeat a story I told her one time. I picked her up, she goes to school in New York, and so she is usually coming in these late-night flights. I picked her up one time at, I think one in the morning from LAX, and we were driving back. I think it was December last year we were driving back home from LAX to Irvine. She had worked in the summer as an 18-year-old, and she had made a little less than \$5,000 over the summer. The IRA rules allow you to put up to \$5500 into an IRA, or if you make less than 5500 the amount you earned. If you made 4,000, for example, you could put 4,000 to an IRA. I had asked her to open a Roth IRA and then we had put the \$5,000 or so into that Roth IRA. She is in the car almost falling asleep and I was saying, you're 18 years old let us fast forward to when you are 68 years old which is 50 years from now. Let us say that, that \$5,000 is growing at something like, let's say 10% a year or something, for example. I said that, "what would it be when you are 68 years old?" If you are compounding at 10% rule of 72 every seven years, and money is going to double. You could take 49 years due to the power seven.

What is due to the power seven is that 128. You take the 5,000 and you are at about something like 700,000 or something like 650,000 or something at that rate. That is at the age of 18. If she does another internship at the age of 19 with something similar, and then eventually at maybe 22 or 23 enters the workforce. Let us say when she enters the workforce, she gets a \$60,000 job or something. At that point, you are maybe hopefully saving 15%, 401k and reducing your income by 10% or something. I mean the key to getting wealthy is to spend less than you earn. Once I told her that she was going to have like 650,000, she was wide awake and she said, what? how did that happen? I explained how it happened, and then I said, but that was at 18. I said, Then at 19, you do another internship that becomes another 600,000 or 20, you do another internship, and eventually you enter the workforce and eventually your thirties, you are making probably six figures and so on. If you keep spending less than you earn, what happens when you are 70. Eventually she gave up, she said, the number is too big, right and the thing with that is that doing no stock picking, to your point, no reading, just party all the time, right? But just make sure that 15% gets saved. The thing is that the key to getting wealthy is actually very simple. Number one, spend less than you earn. Number two, put it into something consistent, some kind of S&P index or something like that. Then number three, don't take loans against it, and don't use it to go on vacation or down payment for your house or any of that. Do all that somewhere else, and just let this go. It is amazing what those numbers will end up being at that time. That is a good way to go and it is not a tragedy if she doesn't get 10%, even 7% will double every 10 years. The key is to start early and have a long runway, and then you end up doing just fine.

Student: Hello. I read that you have an insurance focus company and this is kind of similar to what Warren Buffett has done with his insurance companies. I was wondering what kind of insurance activities you involved or operations you do and how this might relate with your investment fund?

Mohnish: Yeah, We bought an insurance company. It is based in Louisiana. It does workers comp insurance in five states around the south and it does 60 odd million in premiums. It is a nice business. But one of the reasons I wanted to buy the company is that I felt that I would really learn the insurance business. I am getting a big education on the insurance business, and quite frankly, I think I would rather own See's Candies. That is what I learned, I would rather own See's Candy than the insurance business. One of the reasons I did a talk is to get my head focused on Coke and not insurance. Insurance is good business because, obviously you get other people's money to hold but also it has attributes of a commodity business because whenever our insurance company is trying to sell a policy, the people who are buying a policy, think of it like a tax not, no one thinks they are ever going to

file a claim. They want a low price, and they take the cheapest bid. The economics are very different from the economics of Coke. One of the things I learned from owning the insurance company is that I really want See's. That is what I am going to do, focus more on See's, less on insurance. That is what I would recommend to you as well.

Student: My question is about cloning. Charlie talks about how you got to look at what other great investors are doing. In particular, when you look at 13 apps you are kind of looking back in time. How do you personally, when you look at these things, decide or separate the good decisions from the bad decision? What is your yard stake for this?

Mohnish: Well, I think that when you are cloning, there is a couple of things to look at. One is you want to look at the ideas that are the greatest conviction ideas that where people have put the most money. If someone is for example, an investor who has a 50-stock portfolio and nothing is more than 3% of the portfolio, I think there is no point cloning them because you just can't see where they have conviction. But if someone is running a 15-stock portfolio, and the top three stocks make up half the pie, for example, then you know that they have got conviction on those. If you understand something about the way their brains work and their past records and so on, then cloning their best ideas, or at least looking at their best ideas of the starting point for research is a very good thing to do. I would just say that, like in the Coke example, by middle of 89, it was public that Warren was buying Coke. In fact, when the annual report came out, the price was about 10% higher than their cost price. Two years later it had doubled. There was a lot of time for anyone to replicate that if they wanted to. For example, I think typically it is not at all too late to look at something a few weeks after someone has bought it. Because typically, if you are cloning people who are value investors, they are making kind of a longer-term bet and they are looking at relatively large discounts. If you can reverse engineer their logic, and if you can reverse engineer their reasons and still looks cheap and runway still looks good, then that gives you some basis to do something. Yeah.

Student: Can you share with us a little bit about your thoughts as it relates to opportunity cost? Also, when you are weighing up a decision to make an investment, how large of a position are you willing to put into a certain investment as it relates to your entire portfolio?

Mohnish: Yeah, that is a great question. Well, I think that, I used to run Pabrai Investment funds with a very simple model that if we would make a bet, we would make it 10% of assets, kind of a 10-stock portfolio, 10, 12 stocks made kind of sense to me. What I found is that during the financial crisis, we were finding lots of companies where

they were kind of entire classes of businesses that were really cheap. We could get some diversification by buying a basket. I also found sometimes it was better to not always do 10, sometimes a smaller bet was justified. Now what I do is I will either do a 2% or a 5% or 10% just depending on what it looks like. If I get to the point where you are seeing very high discounts to underlying value, at the same time very low probability of a loss, then you can step up and otherwise you can pull back. But I would say that the less bets the better. The more you know about the business and the greater the conviction, the better. Jeff is in the real estate business, he does very well. Specifically in single family homes renting and flipping both. The thing is, if you ask someone like Jeff, you might question what he is doing because everything is in one asset class. It is in almost one geography, maybe a couple of geographies. You might say there is a lot of concentration there, but at the same time the degree of knowledge is very deep. I sense they know what they are doing. In fact, looking at the two of us, I would think that I am maybe too diversified and you might actually have it right, because you are very close to what you are doing, you know what you are doing, and you have been in that space for a long time. There is a lot to be said for the depth of knowledge and such. So, yeah.

Student: I have a question, and it is why did you decide to sell your initial company, TransTech?

Mohnish: Oh because I lost interest in it. I have a rule I followed, actually, I followed that almost from the beginning of my career, that if on Monday morning I am not fired up to go to work, then I do two things. Number one, I don't go to work and number two, I hit the reset button. In the past, before I had my own business hitting the reset button was easy because I could just go to my boss and resign which is what I did. I did it twice where once I actually moved from one part of a company to another part because I just was not excited on Monday morning. The second time I did that was when I quit to start my business TransTech and I ran TransTech from about 1990 till 99, about 10 years. At about 94 or so, I heard about Warren Buffett for the first time, and I started to learn about investing and was quite intrigued by that model and approach. I found that from 94 to 99, I got more and more interested in investing and less and less interested in the IT business to the point that I actually got to a point in, I actually remember the date it is in early February, in 99, where I was not excited to go to work. It was a very strange feeling because, at the time, the company had about 170 people who thought I was excited to be there and I couldn't fake it. I was very confused because I said, there is no one to resign to, there is nobody for me to hand my resignation and do something else. I actually was part of a group called YPO and I met my fellow president and I explained to them the way I was feeling. We had a discussion and they actually made it pretty clear and easy for me. They said, you can own the business without running it. Just find

somebody else to run the business and you can go do whatever else you want to do, right? I thought about it, I said, Yeah, that is it, why didn't I think about that? That sounds like a good, easy decision. They said, look, it will take you six months, maybe eight months to find someone. I couldn't think of someone in the company who I could think is obvious to run the business. They said, just do a search and look for someone, and then when you find someone, you can leave the arena and they said that since you know that you have a finite time, six months, put a smile on your face and go to work every day, because it is coming to an end. That is what I did. They asked me another question. They said that what do you want to do after this new guy comes in and is going to run the business and I told them that ideally what I want to do is I want to go work for Warren Buffett. That is really what I want to do. I don't want to run the IT business. I want to go run work for Warren. They helped me write a letter to Warren applying for a job. Of course, in a week he wrote back saying, "Thanks, but no thanks". Actually, in just about five or six months after that the new CEO came on board and in fact after Warren said no, the same group told me, why don't you just set up a partnership like the Buffett partnerships? I didn't think that was such a bright idea because I said I am not sure how it would scale or whatever else. Anyway, I set up a partnership, but I treated it more like a hobby. Then this guy came on board in like a third quarter of 99, and he took over. A month later, he called me and said, someone wants to buy the business. He had just moved from Texas to Chicago, so I didn't want to pull the rug out from under him. I asked him what he preferred, whether he preferred that we keep the business or we sell it and he said, sell it. I think the reason he said we should sell it is because all his options, everything vested right away one month after he arrived. The people who wanted to buy the business were going to give him a new deal and a new set of options. He didn't even take two seconds to tell me to sell it. That is what we did. The good news was that because this person was already on board they weren't looking at me to run the business, because I already left the scene. Then when we were kind of doing the paperwork for the deal, they still wanted a non-compete on me, and they wanted like a four year non-compete. They said, "for four years, you will not enter the IT business". I told them, I said, "can we make it 40 years instead of four and just add a couple of million to the purchase price?" Because I was absolutely sure I was never going to go back into that business. They said, "No, we are not doing that. We just want four years". That was that. Sorry for the wrong long answer.

Student: I actually want to ask a follow up to this. You sold your IT business and then you moved into investing and of course, Pabrai Investment Funds has been successful. I was wondering what you found to be an unexpected challenge that you wouldn't have expected before you became a professional investor?

Mohnish:

Actually I didn't really find it challenging. What I found very interesting was that couple of things. One is that, when I started the funds in 1999 Buffett had ended his partnerships in 1969, 1970, almost 30 years. The best that I could tell in 30 years, I didn't know of anyone who had set up a model, just like the Buffett partnerships in running, like with zero fees and one for was 6% and all of that. I thought that was kind of strange because I thought that that is a good way to get a competitive advantage because you are basically not telling people, the industry works on just asset gathering and fees and all of that, and it doesn't take into account the interest of the investor. I thought that focusing on giving the investors a good deal would be very good. What actually ended up happening. First I thought about the funds as a hobby. I didn't even think about trying to scale it. Then when the business got sold, and I actually started running it, there was about two and a half million, we started with 1 million, we had about two and a half million a year later. I said, "why do I treat this like a stepchild?" Why don't I actually focus on building this business the way Warren built the business? Of course, there are some issues because the SEC doesn't allow you to advertise or solicit and all that. I was always concerned about how am I going to get more investors and such, but then that problem also I figured out a solution. When we first started, we had eight investors when we started with 1 million, and a year later we had 17 investors. Of course now it is a few hundred, but so when we had those eight investors, and I remember we had our first annual meeting, which was around a conference table and then we went for dinner in my old office in the IT firm. I told these guys, because that time I decided that we want to scale this fund, but I don't know how to scale it. I said, look you have been put on Earth for one reason, and the reason you been put on earth is to bring investors to Pabrai Investment funds; that is your mission. Talk to friends, family, and fools and bring them in, have them contact me, because if Jeff contacts his friend and contacts me, that is fine. I just can't contact them directly, right? What I learned about humans is that, humans are looking for direction. They need to be told what to do, or like Bill Gates says that even if you are a monopoly, you have to ask for the order. What I found is that these investors were actually quite happy, and then they started introducing me to some of their friends and family and so on. We started growing and scaling from there. I didn't really see much of an issue. It was a lot of fun actually to try to in effect. I was reliving the Buffett partnerships about 30 years later. The real first storm we faced was really about nine years after that when we hit the financial crisis. That is when we had Delta Financial go to Zero and so on, and then had to work through that. But I founded a very blissful existence. It was really extremely different from the IT firm. I just left with the 170 people because I had just myself an assistant working 10 hours, and that was it. It was afternoon naps and everything else was great, so nothing to complain about.

Student: Hi. I read that you have a foundation, Dakshana foundation I hope I am saying it right. Can you explain what it means, how you thought of it, how you formed it, and how you decided how we would operate?

Mohnish: Sure. My wife and I set up Dakshana I think in 2007. In 2007, our net worth went over 50 million. I have always felt that large inheritance is actually a burden on your kids. They are not really helpful to them. Actually, my kids are both here. I think they would endorse that idea, especially now that my younger daughter knows that she is going to have more money than what she knows how to do without any help from dad. Basically, once we crossed 50 million, I said I was in the early forties that I did not want to start with a give back when I was really old, because then I wouldn't be able to do much. I would just be able to write a cheque. I knew that giving money away is more difficult than making it. I wanted to have many years of ability to make mistakes, learn and then get better. What we did is we set up the foundation in 2007 and decided we will give away 2% of our assets every year. That would give us over a million dollars a year, and million gave me enough money to do some experimentation, and the idea was to lose, hopefully lose and learn. In 10 years, we would figure out some model that worked. What ended up happening actually is that we didn't lose any money because in the first few weeks we got traction. I wanted to focus on education. I wanted to focus on underprivileged in India. The idea was, if you give a man a fish, you feed him for a day, you teach a man to fish, you feed him for a lifetime. I wanted to teach fishing to very poor kids. We found a model where we identified very poor and gifted kids, and we prepared them for the IIT entrance exam. That model basically forced the Indian government to give large subsidies to these kids once they got in. It worked really well. I mean the wonderful thing about Dakshana is that all of the operations and work is in India. I only go there a couple of times, and usually when I go to India, I never spend any time in the Dakshana office. I think half the time, I have never been stepped in there. I am usually going to either the schools where we run a program or to the homes or the scholars in different rural areas. The team in India, actually, I was very lucky that we got a great partnership with the government of India. We got really good people, have a great CEO, and really they treated it as their baby and built it and such. It worked out really well. Now I think we just bought 110-acre campus near Pune and that was a large bet for us. It was a 10 million bet. We have almost paid it off. We have paid off 8 million so far and that gives us the ability long term to host a few thousand kids there over time. It actually worked out far better than I thought. We didn't have any issues in terms of traction. The model worked well. In fact, a lot of other people have stepped in and become a donor's to Dakshana. I think now half the money comes from my family and half comes from outside. It worked out really well. But it is a good team that helped us do that, so that was great.

Student: Sorry. How do you weigh your focus, kind of value investing versus the desire to diversify your fund? I guess in a way, if you only have five to 10 stocks at a certain time, do you still have the desire to diversify across many industries?

Mohnish: Yeah, I don't actually think about it that way. I just think about it from the point of view that, what can I find that is worth investing in which I can understand, which is undervalued. Then if I can get more diversification in the portfolio without giving up much upside, then I am all for that. Sure, no problem. It just depends on what shows up and such. There's not a lot of activity, there is not a lot of changes, we tend to keep things for a while and so I keep reading stuff and looking at things, and every once in a while things make sense and then we can pull the trigger.

Student: Okay. To take advantage of these buying opportunities, you need cash. Given the fact that you aren't ready to sell something at that exact time and having cash on hand means you are not making money, how do you decide how much cash to keep on hand at a given time?

Mohnish: Yeah, I think one of the things about the Buffett, Munger model is that you don't focus on being fully invested. You just focus on putting money to work if it makes sense to put it to work. If it doesn't make sense to put it to work, let it sit in cash. The ability to be comfortable with uninvested funds is part of that patience. There is nothing wrong with keeping cash if you don't have anything intelligent to do with it. That is perfectly fine.

Student: Nice to have you here. I am a PhD student in Palmarsh school. I have two questions. The first one is that we are doing research on mutual fund and hedge fund, so I am just wondering whether you are following their, like academic research, if you do, do you find it useful to look at those researchers? If you don't, do you feel that your research is more advanced than researching academic field? The second question is like the opposite to the previous question. If you have any cash on hand, does it ever worries you that you cannot come up with a better idea than the previous one to invest in? Thank you

Mohnish: Yeah. So those are good questions. Well, I didn't fully get the research question you are saying is do you think my research is better than the mutual fund and hedge fund?

Student: I mean there are a lot accounting research like here. Do you find it is useful or I do think that their research is like more advanced or you think you are better at like reading numbers, reading accounting numbers than these professors.

Mohnish: Well, I think like you saw in the Coke example, it is not about the numbers, right? I think that the issue is that for most investments, the factors that will drive long

term success don't have much to do with spreadsheets. They have to do with other kind of either understanding human nature or understanding nuances about certain aspects of how things work rather than running spreadsheets. I think you are better off kind of running it from the vantage point of running spreadsheets. The second is regarding the cash versus opportunities. One of the simple approaches I use is that, we really don't want to buy anything until it is at least half off (50% off). If I were, let us say a hundred percent cash and I am just starting a fund, then that is what I would do. I would look for opportunities where there is a significant mispricing. Of course one of the reasons I gave the talk I gave today is, sometimes the 50 cent dollar bills are not obvious. For example, See's Candies was actually a 25-cent dollar bill or less, but it wasn't obvious. Coke in the late eighties also was a great bet, but it wasn't obvious. The area I would like to get better at is the non-obvious 50 cent dollars lying all around us. That is what I would, and the thing is that, there is two ways you can invest. One is, what I have done historically is look for a 50 cent dollar, let it get to 90 cents and then sell it; buy it 50, sell it 90, and hopefully in the period when I own it, the value grows. It is not exactly 50 to 90, the dollar becomes maybe a dollar 20 or a dollar 50, and so I can buy it 50 cents and sell it a dollar 35. That sort of thing. But I think that what is probably an even better model than that is buying and holding onto these long runway positions. When we met Warren Buffett for lunch in 2008, one of my daughters asked him which of the Berkshire companies, (they owned 70 companies), was his favorite company. He didn't even hesitate for two seconds. He said, it is GEICO. The reason I think he said is GEICO is because it has got the ultimate long runway. Coke has a long runway. I think GEICO's runway possibly, maybe even longer than Coke. I mean, unless we get to a world of self-driven cars across the board at that point, the model has gone. But we are at least a decade or more away from there. He felt that that GEICO's model had, I mean he was most excited about owning GEICO because they used to have 2% market share. Now they are approaching 10%. He said that Warren said that on his hundred birthday they will pass State Farm. He has already planned out the next 14 years of them going pass State Farm. I would say that look for the 50 cent dollar bills, sometimes you find something cheap that is pretty good. But I think getting something that got more of a runway built in and getting those cheap. Sometimes, the funny thing about the investing business is that sometimes you can buy something at 20 times earnings and it can be really cheap depending on the nature of the moat and the runway. Alright.

Student: Hi thank you for the talk today. I am also a PhD student here. My question is how long does it take for you to terminate a position or more in general, how long does it take for you to realize you made a mistake?

Mohnish: Sometimes a very long time, sometimes too long. I mean, once I know something is a mistake, I will act on obviously then, exiting or whatever else we need to do on that front. But you know, sometimes we don't know things that are mistake till they have gone into CC. That has happened a couple of times to me. The mistakes usually become apparent. Sometimes they become apparent while we own the position. Sometimes we find out and we can get out of the profit, which we are very happy to do. But sometimes we may find out that there is some error we made and that's possibly a loss, but then we will act on that, take the loss and move on.

Student: Final question I want to ask, but I wanted to see if were there any other questions from the audience if you wanted? Yeah

Student: How many stocks is the fund currently watching at any given time? Prices keep fluctuating every day and you are kind of watching you want them to hit your value, I assume how many stocks are on the radar at any given time?

Mohnish: That is not how I run my life. The funny thing is that I always say this story that Ben Graham would go into a grocery store and he would look for what was the biggest discounted item. Then he would buy that and come out and Charlie Munger will go into a grocery store and he will look for what he loves, and then he will keep going back every day till what he loves is on sale. Then he will buy it and come out. Clearly the Munger approach is, I think, is superior and when I mentioned this a few months back at Columbia Business School, one of the students asked me exactly what you asked me, somewhat differently than you, But he asked me, "Do you have a thing, list of things that you love that you are watching?" I felt very sheepish in telling him that I didn't have such a list. Then actually what I did after I came back is I said, You know what? I am going to prepare such a list because such a list is actually a very good idea. I put together, it is not finished yet, I put together a list of businesses that I truly admire, really great businesses. Now, they may not likely be at prices that I am interested in. I am at the stage where I have got, I would say probably, I think that list will be a living breathing list, but I probably have 80, 90% of what might come into it in the next year or two, for example, already on that list. I haven't gone through the motion of actually going through it versus present prices. What I was going to do is one of those things either automated with like a capital IQ feed or something where I can pull triggers in which is not my normal modus operandi or the second is that when there is dislocations then go in and actually I missed one. For example, February 8th, I was actually in India on February 8th, but February 8th was a great day to buy a few things because there was just for a couple of days when the indices really tanked and a lot of things tanked a decent amount. Actually looking back, there were things at that point at prices that I would like to buy now, but they are not at those prices anymore. I missed it. Part of the reason I missed it is because I wasn't paying as

close in attention as I should. We will get what you are suggesting, but it is not my temperament to spend my days looking at screens. What I would prefer is to have that set up and maybe kind of once a week or something just take a quick look at how far off things are from being more interesting in terms of buys and so on. The second thing that I want to get better at, which is part of the reason for the Coke presentation, is that there are these businesses where they are fantastic businesses when they get paired with fantastic managers. If the runways are big, even at not an obviously cheap price those can be great things to buy. That is a lesson that has not been seared in because I am a bargain hunter. I need to sear in the lesson that you pay up sometimes and then take it from there.

Student: You keep mentioning this runway thing and you mentioned Goizueta, he is the wealthiest Hispanic in America now billionaire.

Mohnish: Well he had passed away, he got lung cancer. He was a chain smoker throughout his life. Then 30 days after being diagnosed, he died. Basically, I think this was in the nineties, and Coke went to a lot of turmoil after that because his appointed successor wasn't Goizueta, I mean, wasn't as good. They had a lot of issues, but yeah, Roberto passed away a while back. He passed away in pretty young, like sixties.

Student: In terms of that runway, I think he...

Mohnish: His runway got truncated

Student: Oh, the family, I think they had...

Mohnish: I am talking about the runway of the company. Oh, Coke is an example, Coca Cola company has a very big runway, and it actually had a fantastic runway when Goizueta was in there because you had a great business, on top of it you had a great manager. The amazing thing about Coke is that. Then a few years later, the great manager was gone, a bunch of Yoyos came in to run the business. I still think it is run by Yoyos. Still the business has done well, and part of the reason the business did well was Warren was on the board, they brought him on the board. He is no longer on the board, but I think in the years on the decade plus that he was on the board, he pretty much, I think, ingrained in them the culture of how to allocate capital. Coke has got, I would say at this point, straight and narrow marching orders of how to run the business and that is what they do.

Student: Oh, okay. Thanks. I think so.

Mohnish: God has told them what to do.

Student: All right. I think the family has a brand of food products, the Goizueta family.

Mohnish: Yeah. I am not sure what the, well, the school of business, I think Emory's, Emory University School of Business is named after him. But I am not sure what happened to the Coke stake or what the family did and such, I haven't kept up with that. But that would be a lot of money. I mean, if they kept the two and a half billion, two and a half percent stake, it would be not of four or 5 billion today. It is a significant amount.

Student: Yeah. Thanks for it.

Student: I kept thinking after you said the phrase that “if you don't wake up with energy every morning, you should rethink what you are doing”.

Mohnish: Are you excited about your life?

Student: Yeah, I am fully excited

Mohnish: Okay. Just checking.

Student: But would you recommend that idea also to, for example me as an undergrad, I still have long way to go. Would you re recommend that idea to me, even though I don't have like a worth like yours?

Mohnish: Oh, yeah. I think that it is not a matter of net worth. I mean, I followed this edict when I had no money. I have followed the edict and I think Warren also says that you should go to work for business for people that you like, admire and trust. It doesn't matter. The money is irrelevant. I mean, quite frankly you are in a country, my father-in-law jokes that the US is one of the only countries where the poor people are fat. You are in a country where even if you don't have money, you are not going to starve. Basically there is plenty of safety nets in this country. The good news is there is a bottom below which you can't go unless you have got other mental, mental issues or other things going on. If you have your facilities about you, you don't have much of a downside and what you ought to do, because you are well educated and you have got lots of skills in a society that values those skills that you focus on working with people that you enjoy working with and doing work that you enjoy doing. If those factors are not being met, hit the reset button. Pretty simple. I think what will end up happening is that if you truly do what you love doing, then you will do it well, and you will actually do well in your career. It actually has a payoff, every time I have actually hit the reset button, it is led to higher highs. The reset button, at least for me, has never hurt me, even though when I hit the reset button, I am actually going into an unknown. But it has been fine. The unknown has been fine.

Student: Other questions. Okay, I figured this would be an appropriate question to end on, which is, the class has a variety of students, some want to do science as a career, some more or less, just they don't want to spend a lot of time, but everyone always wants more investment return. I was curious what you regard as the biggest mistake for each of that group. You touched on right, that to some extent, but I think we make it crisp for the last question, what you regard as the biggest mistake for people who want to be professional investors and people who you have other priorities in their life.

Mohnish: Yeah. I think the professional investor, that is actually what I was trying to get across in this talk, I think investing is one of the most interesting disciplines because it crosses boundaries. I mean, you saw in this talk the range of issues that come up in making an investment. It goes across disciplines, across all kinds of understanding human nuances and so on. I think of investing actually as being one of the broadest disciplines. If you are a person who enjoys that, who enjoys waiting across different disciplines, reading, learning, understanding how humanity works, and how the world works then this may be the right place to you. Also then look at those three factors. The patience, the decisiveness, and then willingness to be drift different. If those are you, then it makes sense. For the crowd that doesn't want to be in this field, there is nothing wrong with that. There is a hundred different ways to live your life. Investing is just one of them.

Student: What you regard is like the biggest mistake in their invest, like the biggest landmine to avoid. This is like the inversion thing where you want to try and avoid a big mistake. For the non-professional investors, what would you advice regardless?

Mohnish: Well, the non-professional investor, I would say indexing is a very good way to go. I would say that even if you are trying to pick investment managers, I think that is a very difficult exercise to embark on. It is not the subject of the talk we went to today, but I would say that if you are a no nothing investor or investor who doesn't do this full time and such, then certainly taking an index approach is a very good way to avoid a lot of pitfalls. The key is like I told you with the example of compounding, Einstein called it the "eight wonder of the world". The key is that if you are spending less than you earn and you just sock it away, and with the ups and downs of the stock market, I mean the S&P will last a hundred years, still done 9% a year. You will still end up at a decent place.

Student: Okay. I want to do two things, first a round of applause for Mr. Pabrai.

Mohnish: Thank you.

Student: We have two things for you. One is a UC Irvine Cap.

Mohnish: Oh good.

Student: We will have you decked out in UCI here and the second thing is last year, 2015, was the university's 50th anniversary and they produced this book and there are a lot of great pictures actually from 1965.

Mohnish: Oh, great

Student: When the University first started, I had a lot of fun when I was looking at the bookstore.

Mohnish: That is great.

Student: Yeah, so those are for you.

Mohnish: Well, thank you very much.

Student: Thank you again for coming to talk to the class and thanks to everyone for coming as well.

Mohnish: Thank you. Okay that is great

Student: Thank you.