

## The Best of NERA 2006

Tuesday, July 25, 2006

THERESA GABALDON: Good afternoon. I'm Theresa Gabaldon, Professor of Law and Carville Dickinson Benson Research Professor of Law at The George Washington University Law School, and host of the 2006 Fireside Chat series presented by the Securities and Exchange Commission Historical Society. The Securities and Exchange Commission Historical Society, a non-profit organization independent of and separate from the SEC, preserves and shares SEC and securities history through its virtual museum and archive at [www.sechistorical.org](http://www.sechistorical.org). The Fireside Chats are one of the many online programs, which the Society broadcasts live on [www.sechistorical.org](http://www.sechistorical.org) each year and then preserves in both audio and transcript formats within the museum. All programs and materials in the museum are free and available worldwide 24/7.

It's my privilege today to welcome back members of the staff of NERA Economic Consulting, presenting what have been deemed the top presentations from their recent Finance, Law and Securities seminar. I begin my Society broadcast career in 2004, with the first Best of NERA online program and it's good to be back for the third annual discussion.

Joining me today are Dr. Elaine Buckberg, NERA Vice President, who is also a panelist on the first Best of NERA; Dr. Patrick Conroy, a Vice President with NERA Economic Consulting; and Dr. Faten Sabry, also a NERA Vice President.

The comments made today are solely those of the speakers and are not representative of the Society. Our speakers cannot give investment or legal advice.

I'd like to thank NERA Economic Consulting for its sponsorship of today's chat. as well as to acknowledge Pfizer Inc.'s generous support throughout this year for the 2006 Fireside Chat series. As the SEC Historical Society receives no federal funding, the virtual museum and archive, including programs such as today's, are made possible solely by gifts and grants.

Today's chat looks at some of the major issues in securities regulation today, including disgorgement, options backdating and mutual fund fees. I'd like to begin our discussion with Dr. Elaine Buckberg's comments on disgorgement. Elaine, it's good to have you back.

DR. ELAINE BUCKBERG: Thank you, Theresa. The SEC has long sought disgorgement from corporate executives involved in securities fraud, but this is only becoming more common. Sarbanes-Oxley has made this longstanding civil remedy mandatory for the CEO and CFO of any company restating its earnings due to material misrepresentations.

Today, I'll discuss the proper measurement of disgorgement from legal and economic perspectives. Both case law and economics support the calculation of disgorgement as the net economic gain from the alleged misconduct. In other words, disgorgement should be the difference between what the executive earned and what they would have earned in the absence of the fraud.

Let me briefly review the standards for disgorgement. Disgorgement is intended as a deterrent to fraud designed to ensure that securities law violators do not keep their gains. However, disgorgement is an equitable remedy. As such, disgorgement itself cannot be punitive, although the court may impose penalties in addition to disgorgement and these penalties are often

calculated as some multiple of the disgorgement amount. Disgorgement is also not compensatory. The SEC can ask for disgorgement even if there are no identifiable victims, although the SEC typically will contribute any disgorged monies to a victim's compensation fund.

In order for disgorgement to be equitable, it must be causally related to the fraud, and this requirement is quite strictly enforced. This means that disgorgement of trading profits must be limited to gains prior to a corrective disclosure, consistent with the efficient markets hypothesis. Moreover, gains from the fraud must be offset by losses incurred through the same fraud. This kind of netting is routinely used in calculating damages in securities fraud as well as tax cases. The SEC takes the lead in a disgorgement case typically quantifying its disgorgement demand in the complaint. The SEC typically will present the largest disgorgement figure the facts allow, and the SEC is entitled to disgorgement based on a showing of a reasonable approximation of a defendant's illegal profit. The courts will initially presume the SEC's initial demand to be reasonable.

The burden then shifts to the defendant to present an alternative calculation and show that the SEC's calculation is not reasonable. If the defendant can demonstrate that the SEC's calculation is overly broad and fails to exclude amounts not causally related to the misconduct, the courts will reject the SEC's calculation and reduce or eliminate the disgorgement award. That said, it's not sufficient for the defense to simply critique the SEC's calculation. In *SEC versus Antar*, the court ruled that the defense did not fulfill its burden because it did not present an alternate calculation or witnesses at the disgorgement phase of the trial.

What kinds of unjust enrichment does the SEC seek to be disgorged? Sarbanes-Oxley specifies the disgorgement of incentive-based compensation; there are three major types of incentive-based compensation. The first is cash bonuses based on financial performances. A company's compensation committee typically sets a formula at the beginning of the fiscal year, keying up bonuses to earnings or earnings growth or some other measure of profitability. Often, if there is an incentive plan, the executives are aware of the formula, and so in principle, if fraud were going on, they could attempt to game the formula. The SEC also asked for trading in stock or derivatives.

The third major form of incentive compensation involves options grants. These may be affected if fraud affects the stock prices. Fraud could also include options backdating, which has been so much in the news in recent weeks, and which my colleague Pat will discuss in a few minutes.

The SEC might also seek disgorgement relating to below-market loans, as in the *Tyco* case, and retirement benefits, which often key off bonuses.

Let's break the net economic gain approach to calculating disgorgement into two major concepts.

The first of those is netting of losses against gains. The second is market efficiency. Courts enforce the standard that only net gains be disgorged. And let me give you some examples.

The first is *SEC versus McCaskey*. McCaskey was a not-very-successful insider trader; he lost money. The SEC demanded disgorgement of his gross trading profits, ignoring his trading losses and the commissions he incurred during the manipulation. The district court disagreed with the SEC, however, and granted offsets. In fact, because he incurred net losses, there was no disgorgement.

In SEC versus Credit Bank Corp., the SEC demanded disgorgement of the gross revenues that were remitted to a trustee. However, the court halved this demand by deducting the necessary expenses incurred by the trustee to commit the fraud, for example, his office rent. It's worth noting that while the SEC did not net in these cases, the SEC has provided for netting in its own proposals in compensating victims. And here I'd point you to SEC versus Lang. The amount disgorged was subsequently used in this case for a victim's compensation fund. And the SEC has claimants demonstrate that they were net sellers during the fraud period as opposed to simply having sales. Moreover to determine the amount that a shareholder claimant would receive from the proceeds of the disgorgement action, the SEC requested that the claimants compute their net losses involving both their losses from stock sales offset by profits from stock purchases.

From an economic perspective, the legal requirement that disgorgement be causally-related to the fraud has caused the courts to incorporate a presumption of market efficiency in disgorgement decisions. The efficient market hypothesis asserts that if a stock or other security trades in an efficient market, all information in the public domain will be incorporated in the price. If fraud occurs, and is disclosed, the market will immediately re-price the stock based on the disclosure.

For a defendant's trading gains to be causally related to the fraud, only those gains before the disclosure should be disgorged. Any gain subsequent to the disclosure cannot be the result of the fraud because it's already been disclosed.

The presumption of market efficiency was of course, decisively incorporated into securities law by the Supreme Court in Basic v. Levinson. Every disgorgement decision since Basic has adopted the efficient market hypothesis in determining disgorgement of trading gains or losses. In fact, disgorgement decisions that predated Basic also were consistent with market efficiency. One of these is SEC versus Texas Gold Sulphur. Here, the SEC came forth with their disgorgement recommendation that was consistent with market efficiency. They asked for disgorgement of profits up through the day in which the news came into the market, and excluded the subsequent rise in the stock price while the defendants were still holding. The Circuit Court affirmed this decision.

Another case is SEC versus McDonald. McDonald is an interesting case. He was an insider trader, who purchased stock about two weeks prior to a disclosure of a merger announcement. He then held it for another year, so he made 19% up to the merger announcement and another 80% by holding for an additional year. The SEC asked for disgorgement of all of his gains up until a year after the disclosure. The Circuit remanded the case however, to the District with orders to cut off disgorgement within a reasonable time after the disclosure.

In shareholder class action litigation, it's become conventional to use event studies, in order to both demonstrate what price movement may be attributed to a disclosure. This amount is then used in the calculation of damages. Similarly, event studies can be used in disgorgement cases. First they can be used to demonstrate or disprove the materiality of the alleged disclosures, and second, to measure the price movement attributable to the disclosure and hence, to the fraud. The SEC has also supported the use of event studies in determining disgorgement. A 1994 article by SEC staffers Mark Mitchell and Jeffrey Netter stated, "The SEC recently began to use stock price evidence to share materiality and securities fraud cases, especially insider trading cases. Statistical tests of significance are used for both in establishing materiality and in calculating disgorgement."

In conclusion, the discretion afforded to the district courts in determining disgorgement awards gives defendants an opportunity to contest the SEC's disgorgement methodology. This is also consistent with the concept of an equitable remedy. Where the defense can persuasively demonstrate that net economic gains are lower than the SEC's calculation, they may be able to reduce or eliminate viability.

THERESA GABALDON: Thank you Elaine, that was fascinating, and raised some interesting questions that we'll deal with in a general discussion following the other presentation.

We turn next to Dr. Patrick Conroy for enlightenment on the much-in-the-news subject of options backdating. Patrick?

DR. PATRICK CONROY: Thank you, it is much in the news. In fact, I noticed this morning, it was the first morning it wasn't on one of the front page of one of the sections of The Wall Street Journal, but The New York Times kept the streak going, so they kept it on the front page of their business section.

Since it's the Historical Society of the SEC, I thought I would just start off a little bit of my own history, which was a part to it. I worked at the SEC for few years in the late '90s and I always used to roam around down in the library. I came across kind of an old-school report, pre-word processor, from the '60s. It was beautifully handwritten on regular type writing paper and then it had graph paper with all the graphs were hand-drawn. And oddly enough, it was on options grants of two executives of major companies in the '60s. So I don't think this is a new issue. How people feel about options and certainly all of this backdating has simply brought it to the forefront.

Let's start quickly with what an option is. Since we are not drawing pictures I just want to describe a few of the terms most people know, with the prevalence of them in the '90s, that a call option gives you the right to buy securities or to buy stock. The benefit of that is you have the rights to buy, but not the obligation to buy. So, a strike price is set at, say \$5 and if the current price is \$10 then you have the opportunity to buy something for \$5 which is worth \$10, which is a good thing. Then you can sell it for \$10.

A lot of terms are thrown around like intrinsic value, strike price and vesting period, and all of these terms are simply how the option is defined. The strike price is the price that is set in which you can exercise it out. The time is the amount of time you have till the option expires. The vesting period is set by the company for the employees in when they're allowed to exercise these options. And typically during the time period everyone is talking about, they were vested over four years. So if you received a grant of 10,000 shares you might only be able to actually vest 2,500 per year for four years. And that was common because not only are you hoping that the price goes up, but they want you to have a long term connection to the company in terms of vesting it.

So, there's usually a picture which looks kind of like a hockey stick. And so as the price goes up, you're able to make more money. Why did people make huge sums of money off of this? Well, if you read the paper today, in Brocade, some of the options' strike price was maybe \$20 or \$30 per share. And when the price was a \$133 a share, clearly that's all profit and very valuable to the person who is holding those.

So what's all the backdating about? Well we can call it backdating, we could also just call it back pricing. The date's really irrelevant. The fact of the matter is just that they are taking the price which is not the current price. So when the options are being granted the committee which is granting them gets together, the current price of the stock could be \$10, and they can look back in the past and say gee, you know what, a couple of months ago it was \$5, let's set the price at \$5. Now from talking about the intrinsic value and strike price, if I have the current price as \$10 in the market but I'm setting the strike price at \$5, you're already \$5 in the money. So you actually made a \$5 profit per share, kind of. Your stock is not vested, so you can't go out and really do anything with it. You have that sitting there waiting for you.

So, it's backpricing. Is there anything wrong with setting a price which is below the current price for the strike price? Again, not really. You can do it as long as you tell people that's what you're doing and they understand it. And I think that's the crux of the problem we have now which is, what these companies have done is set the strike price lower than the current price at the time they granted the option. But instead of letting the public investors realize that there's a \$5 profit builds in to that, it appears that they were at the money. In other words, it appears that both the strike price and the price on the day at which the option was set was \$5. That's the problem we're getting into now.

How do we deal with this in terms of accounting? What are people looking for? And what are they upset about? What is this? It's a violation in GAAP because it's a compensation expense and it should have been expensed off of people's net income, had they accounted for it correctly. Let me give you a quick example. Suppose a company has revenue of \$1,000. If they granted options when the current price of the stock was \$10, with a strike price of \$10 on that day, it's not taken as a compensation expense. So, if I were simply deducting that as their only expense off of their revenue, then pre-tax net income would still be a \$1,000. However, take a scenario where that company granted the same number of options, however backdated the strike price to \$5 which occurred say a month earlier. Now the amount --in the money, \$500 would have to be taken off of revenue. And so therefore pretax net income fell by \$500.

What's going to happen in the case is going forward, these companies are starting to have to look how they're going to restate. Was it the case that they were giving employees compensation and giving them compensation expense which they should have taken off of net income, which they didn't?

Why is that important? Consider yourself as an investor during this time in which you are purchasing a security and you think that earnings are X. In fact, they were less than X simply because the company didn't take off the compensation expense correctly. There are nuances to this. Companies are allowed to deduct compensation expense if it is performance based. But there are nuances in terms of it being greater than or less than a \$1 million and other issues which are going to affect in the long run, whether or not the company would have to restate.

So what happens when a company has done backdating of options and not accounted for it correctly? The compensation expense was actually higher than they told you. Their net income was actually lower than they told you. Their shares outstanding didn't change because the option grant of the number of shares stays the same. But their earnings per share has actually fallen already enough there can be no cash change to this, simply because of the way it's accounted for.

How was all this discovered? Well, as usual there was simply an academic who was looking through. It's not easy to tell if options have been backdated off of the financial statements of a

company. So, they ran a statistical procedure to estimate how likely was it that these options grants which were occurring could have occurred at the prices where they were. And what they found was an inordinate portion of time when these took place at the lowest possible price. It was simply statistically very unlikely that randomly they had been able to pick all of the lowest prices. That's where the paper came out. And I think it was actually several years ago and people had been working on it since then.

How are these suits going to progress? Well, it's interesting. Statistically, a lot of times there seems to be very little price reaction from the announcement, not necessarily the first companies that come out with it, there's a stigma associated with the options backdating. But in general, as economists, as investors, what you look for is the discounted value of future cash flow. So let's take a company which for instance had backdated their options. Is this at this point in time going to change their future cash flow? The answer is probably no. In addition, there may be some companies where the dollar value of this is huge, for instance Brocade, there are many companies that will have fairly small dollar value in changes in that income due to their options vesting. So, some of these suits may become 10b-5 securities class actions, but many likely will become derivative suits.

One question that keeps coming up in the press that we read about is the incentive. What incentives these stock options really give people? That's a difficult question to answer. I think there have been academic studies on both sides. Some people will tell you regardless, if you give someone securities which are in the money, they still have an incentive until the stock price goes even higher. It seems to have changed recently as stock options are falling out of favor that people are getting shares of restricted stock. If you think about a share-restricted stock, instead of now giving them something which gives them the opportunity to benefit in the future, by giving them restricted stock, you've actually giving them the money, plus the option to benefit in the future if they choose to hold the stock. So like most things coming in and out of fad, stock options have gone out and they're being replaced somewhat by restricted stocks. But it remains to be seen whether that's going to create the same incentives the stock options did during their heyday.

THERESA GABALDON: Thank you, Patrick. I've learnt a great deal from that. Once again we'll hold off on questions until after the final presentation, which will be made by Dr. Faten Sabry on the subject of mutual fund advisory fees. Faten, you're last, certainly not the least.

DR. FATEN SABRY: Thank you. The main question that I'm addressing is what determines how much money is paid to the advisor or management company of a mutual fund? This question is really at the heart of a lot of litigation on fees. It's also of interest to regulators. It has been of considerable interest to Mr. Spitzer, and of course, is of interest to the shareholders of mutual funds.

According to the latest statistics, more than half of U.S. households invest in mutual funds directly or indirectly through retirement plans. So, I guess many of the people listening in today are probably investing at least some of their savings in mutual funds. And for those who do, I wonder how many of them know how fees and expenses of funds are determined? More specifically, how much the advisor or the management of the fund gets paid? These are the main questions that I'll address in the next few minutes.

I'll start with a very brief introduction of mutual funds and how they are structured. I really believe that the legal structure of a mutual fund has a lot to do with why advisory fees is even an issue to start with. I'll then briefly discuss the different types of fees and expenses. I'll explain

the various determinants of fees that came out of an analysis we did, and a database that NERA has put together from public findings of mutual funds. And if there is any time I'll briefly describe some recent changes in regulation regarding disclosure of fees.

A typical mutual fund is organized by a sponsor who expects to profit by providing advice and other services to the fund. The fund itself is usually set up as a corporation, sometimes as an investment trust, and it's managed by or under its own board of directors. The sponsor chooses the initial board which enters into a management contract for the fund by which it provides advisory services. The mutual funds are really externally managed; the fund itself has a few original employees of its own. The main role of the board of directors is to be sort of a watchdog, looking out for the interest of investors. So when you and I invest in a mutual fund we're buying shares or a buying a portion of the mutual fund and we are the shareholders of the fund. The board of directors negotiates and oversees the funds activities. The main thing they do is approve and negotiate the contract with the advisor and the other services providers to the fund. There are many other players in the structure of a mutual fund, but these are really the key ones that are relevant to our discussion today.

So what fees am I talking about and what do mutual funds get in return for these fees? The main line item in the expenses of any mutual fund is their management fees or advisory fees. A mutual fund pays this money to an advisor or a management company, and I will use these terms interchangeably, in return for management. The advisor conducts research, makes fund investment decisions, does a lot of share holder servicing, holds shareholders meetings, and issues and cancels share certifications and the like.

There are other types of fees and expenses that a mutual fund incurs. For example, there are distribution fees. These are fees that are paid for marketing and advertising. There are other types of expenses related to shareholder services like a toll-free number and computerized account services. These line items, when they add them up, reflect the operating expenses of a fund. The norm in this industry is to present these expenses as a ratio of the total net asset of the fund. For example, you will see in the prospectus that is mailed to investors a number saying total operating expense is 1.2%. Whatever they really mean is, 1.2% of the total net assets of that fund. Another way that this is also expressed in this industry is to say the total operating expense is 120 basis points. They are used to mean the same thing.

Now using this database of over 9,000 mutual funds, if you look at the composition of their operating expenses, you will find that regardless of the type of that fund or its size, the advisory fees constitute the single largest line item of their expenses regardless of whether it's a bond fund or an equity fund and it's usually about half of all operating expenses go to paying the management company or the advisor of the fund.

What NERA did, in order to examine these fees a little bit more and try to figure out what determines how the fees are set, we collected the public filings of all mutual funds known as the N-SAR forms that were filed from 1992 to 2005. According to law, each mutual fund is required to file two N-SAR forms, one covering the first part of the year and another covering the full year. We collected all these filings, so we would have data on the fund composition of each fund, the trading activity, the type, the size of the funds, the assets under management and more importantly and most relevant to this fees issue is we have data on the structure of the contracts that are set between the mutual funds and the advisors.

When we examined the actual fee rates for all equity funds in our database, we find that the median is about 75 basis points, or 0.75%. But we also notice a lot of variation in the fees. So

there are mutual funds that pay their advisors something less than 20 basis points. Other pay something above 160 to 180 basis points -- so the variation is astounding really. Basically our analysis of the database shows that there are several factors related that can help explain advisory fees.

One factor has to do with the risk. Mutual funds come in different flavors of risk. On the one extreme of very low risk we have bond funds, income funds. These are funds which focus mainly on receipt of income as an investment strategy. And then on the other extreme, we have funds that focus solely on short term appreciation through high risk investments. And these are called the capital appreciation funds. And as you would expect, the riskier the fund, the more costly it is to manage. So a bond fund would pay an advisor, on average, 50 basis points or 0.5% of their total net assets as fees, whereas a capital appreciation could pay anything in the range of 90 to a 100 basis points, to manage their funds. So that's one element or one factor that can explain the variation of these fees that we observe in the data.

Another factor is size. And this also is a big issue in the fee, in the litigation. As the funds grow in size, we do see that their fees decline from maybe something in the range of 75 bases points for a fund that's of a small size which is a \$109 in that industry, to 45 basis point for a fund that's in the billions of dollars. So, this whole issue addresses or speaks to the economies of scale, which is as the funds grow in size, the cost of doing research and managing the portfolio doesn't necessarily double with it. So, you should expect to see, if there are economies of scale, and they are being passed on to the investors, the fees going down as the funds grow in size.

Another important factor which I think that we can capture with this database is the structure of the contract. There are different ways that a mutual fund can structure the incentives for the advisor. A contract with an advisor can be based solely on the assets under management, and this is really what most mutual funds do, or it could be based on performance or relative performance. Within the contracts based on assets only, a fund can agree to pay a flat fee. Mutual funds will tell the advisor, we'll pay you 70 basis points, no matter how much our assets grow or they would agree on break points. And the way break points work is simply as the funds grow in size, the mutual finds agree with the advisor that they will reduce the fee.

We have data on the contractual fees what they agreed on and what they actually ended up paying. If you look at the data of the fees as set in the contract, it does appear to be that if you do, if the mutual fund agrees on break points that they are getting a good deal, contractually at least. But, and here is the interesting twist, is that when we look at the actual fees paid, it's not clear that a mutual fund is necessarily paying more if they agree on a flat fee contract versus a break point fee. The issue is little bit more complicated than just looking at one dimension of the structure of the contract.

So what do we conclude from that? We conclude that, in order to really figure out how fees are assessed or determined, one has to control or take into account various factors such as the number and quality of services offered, the performance, and I would say, the risk adjusted performance and whether there are economies of scale, the incentives structure of the contract of the advisor and of course the investment style and risk.

THERESA GABALDON: Thank you, that was quite informative. We'll turn now to the discussion part of the program. I have a few questions suggested by each of your topics as well some general questions. I'd encourage each of you to weigh in on each question and react to one another, as you see fit.



First, in the area of disgorgement, Elaine, you made it clear that courts traditionally have been very interested in strict causal relationships between the act of wrongdoing and the amount to be disgorged. And at the same time you indicated that the purpose of the disgorgement remedy is deterrence. Why not err then on the side of ordering disgorgement of all subsequent profit, as opposed to being so interested in exactly how much is attributable to the wrongdoing?

DR. ELAINE BUCKBERG: If we were looking at McDonald, where he profits for two weeks on insider information, and then makes most of his money during the subsequent year, why not ask for everything?

THERESA GABALDON: Exactly.

DR. ELAINE BUCKBERG: Disgorgement, first of all, is an equitable remedy and its equitable roots go back to British common law. As long as you are in the disgorgement world, that's what you are asking for. However, one can impose penalties. So, for example, again considering insider trading, penalties can be up to treble the disgorgement amount. So the disgorgement is intended to send the message that you just can't keep your profits and then the penalty option available to the judge is designed to capture the punitive aspect. It's a three part approach.

THERESA GABALDON: And to make sure that the defenders don't go into it just thinking, well I've got nothing to lose here by trying it. All they can do is take away my profit.

DR. ELAINE BUCKBERG: You're right.

THERESA GABALDON: They lose something.

DR. ELAINE BUCKBERG: To be candid, the penalty will often be set as a function of capacity to pay.

THERESA GABALDON: That seems reasonable. Now I'm interested in pursuing for a few minutes the theme of incentive effects and here there was this deterrent effect of disgorgement. In the area of stock options, I think that Patrick, you did make some comments having to do with the interaction of backdating and the options and the incentives that are given to executives to do the best possible for their company. Does it seem to you backdating ruins the incentive effect of stock options?

DR. PATRICK CONROY: Look, there are academic studies that might even suggest that having some money in already actually increases the incentives. But in general, we all have different, in the economics term, utility functions. We all decide what is important to us. We read in the news of people who have already made hundreds of millions of dollars who are still interested in making more. So it seems that they still seem to have an incentive to make more money. Everyone has an additional incentive.

At some level, there are people who simply have the incentive to see their company do well and being compensated for that as just being part of the market. We're always going to follow that on the argument of our executives, or even regular people over compensation, were they over compensated in this area. We can go down to the fact that there were people during the Internet boom at companies right out here in Dulles, Virginia who probably started in positions, upon which they became millionaires where in other companies, they never would have had that opportunity.

Were they over compensated; did they lose their incentive? I don't know. So I think in a raw mathematic way, you'd say, sure, you have less incentive because you're simply wealthier, because you have part of your money there. But I was alluding to restricted stock because restricted stock is simply giving one the actual equity with some restrictions on when they cannot sell it. And some of the anecdotal evidence is that people are favoring that now over options because of all bad press options has gotten. But clearly, companies feel that's still an incentive to be a part owner and to have a keen individual interest in the profit stream and cash flow of the company.

THERESA GABALDON: From what you said, there isn't any indication at all that issuers who backdated options sometime in the past were underperformers vis-à-vis other some more companies.

DR. PATRICK CONROY: I think that will be the crux of all the damage and hassles to come, as I think that is the salient question. Even after all of the of the backdating comes to the forefront and you see what happened when, the question is going to become, how would it have affected it at that time, meaning if it had changed income of the company. I suppose companies wouldn't have been able to get key employees because they weren't able to offer options. Included in the backdated options in first place were in part, in some ways Microsoft did it in the 90's and then stopped the practice. I mean, you didn't want to hire two people, one on Monday and one on Friday, and have them have a difference in compensation of \$100,000 and have one of them be disgruntled. So maybe you would give them the average or the low over the 30 days to try and smooth those things out. So I don't think these were always nefarious reasons. In fact, part of them may have been just to align people together.

THERESA GABALDON: Very interesting. Now the theme of incentive that's shared by disgorgement and stock options, I think also is, would clearly be relevant in the area of mutual fund advisory fees. Faten, I had seen from your presentation that there is relatively little use of incentive compensation in the mutual fund area. Is that a correct reading and if so, what explains it?

DR. FATEN SABRY: Some academics argue that this is the case, and the reason behind that is because the way the industry is structured is you have this sponsor setting up a mutual fund. and then the boards of directors that is picked by the person who is the sponsor are expected to negotiate with the sponsor or with the management company about the fees. Where there are -- well, that's on one side. There are some academics who argue that.

Then there are others who say, wait a minute, 40% of the board of directors have to be independent by law under the Investment Act of 1940 and even the SEC even tried in '04 to issue a ruling requiring that the not just 40 but 75% of their board of directors have to be independent. The rule has been since overruled and the SEC is soliciting comments at this point. And I think up until the end of August, the industry still has some time to respond to that. So there is the issue of that at least 40% of the directors are independent. But I think it's still a little bit complicated because the advisor is providing a product that has multiplied attributes to it. Because the mutual fund itself has no employees, the advisor really makes or breaks the funds. He is the performer. If the fund succeeds, the advisor has a lot to do with the success of that fund, it seems to me.

So I think that that there are enough incentives now in place to for the advisor to do the right thing. Besides the contract is renewed every year, they negotiate it every year. And now with

the new regulations about disclosure, the mutual fund has to disclose the reasons for setting up the fees the way they did.

DR. ELAINE BUCKBERG: Let me express that from another angle. If you look at the difference between fee contracts which are flat fee regardless of the assets under management and those with break points, in other words, the percentage fees declines with the assets under management. Those have different incentives. Essentially the flat fee offers higher incentives. So let's think initially about a fund that has a \$1 billion in assets under management. And let's assume for the moment that they're not taking any, for one reason or the other, they are either not taking new shareholders, where they get new shareholders in a year, but they may get 25% return, right? Then that means that next year that the exact same shareholders, they get to make 25% more.

However, instead you have break points. So let's assume that originally you get 1%. On \$1 billion you get 1%, but on \$1.25 billion you get 0.9%. Well, the upside incentive and the increase in income to the managers is lesser in this concept under break points. The same thing applies, if you think not just about the growth and the size of the fund due to the investment decisions, but also a well-performing fund will even grow more rapidly because it will attract additional investors who look favorably on the track record of the managers despite that constant disclaimer that past performance is not an indication of future returns.

So really, the difference is in the flat fee versus the break point fee structure really speaks to how much incentive you want to give to your fund managers.

DR. PATRICK CONROY: I'll add only one thing, which is the management company almost never gets fired. I think I only know of one instance ever, where the board of directors in recent history has switched management companies.

THERESA GABALDON: And it made it to The New York Times front page.

DR. PATRICK CONROY: That's right. Other than that, the trustees have options to negotiate and they have a nuclear bomb, which is, we're going to fire you as our management company. So there is not a lot in between for them to work with.

THERESA GABALDON: Do you know of there's much information available about the profitability of the management companies themselves, as what are their profit margins?

DR. PATRICK CONROY: Publicly? I don't think there's a lot publicly out there.

DR. ELAINE BUCKBERG: Lots of funds are actually farmed out to several different sub-managers rather than just one manager-advisor. Sometime they are part of public companies but they'll be a small part of the public company. Other times they are the privately held and so probably wouldn't be public.

THERESA GABALDON: It wouldn't be surprising though to think that the directors of a mutual fund would be interested in making enquiry into the subject when they're negotiating, so perhaps it's addressed that way.

DR. FATEN SABRY: I think that now they have to, according to the new rules now regarding disclosure of fees, where specifically the SEC said you have to disclose as a mutual fund, the basis for choosing your fees and how you selected it, what other comparative fees structures

you looked at, and why you picked the fees you did. So I think we'll see now in the most recent findings of the funds, what they say about that.

THERESA GABALDON: You introduced your talk with a reference to recent changes. Have there been any others that were particularly noteworthy?

DR. FATEN SABRY: Well there was the 75% independent ruling that was overturned. And it's now that the SEC is soliciting comments. So we'll see if this will be enacted or not. But these are the two main rules. In terms of regulation this was significant.

THERESA GABALDON: Speaking of current events, I'm wondering what effect Sarbanes-Oxley had, and I guess it's not that recent for it to be so much in news or on people's minds. What effect that had on each of the areas that you, Elaine, and you, Patrick talked about? Elaine, any effect on disgorgement?

DR. ELAINE BUCKBERG: Sarbanes-Oxley makes the disgorgement remedy, which was always available to the SEC, mandatory in a lot of the cases. The SEC used it substantially in insider trading, and historically probably used it less in the areas of corporate fraud and going after the gains to executives. Now they have to. Sarbanes-Oxley states that, in any case where you have a restatement due to material representation, or in other words, a restatement due to inappropriate decisions and wrongdoing, the CEO and the CFO must be forced to disgorge all their incentive-based compensations. So this basically means that every time you have an accounting fraud, some sort of fraudulent restatement, the SEC is now going to be compelled to bring these cases. So it's going to be a much more common remedy. And that's why we thought it was interesting to start thinking and talking about a methodology for calculating disgorgement that is truly equitable and truly captures the net effect for the executives. Because what we're trying to do with the net economic gains approach is to capture the effect that, while if you consider a multiyear securities fraud for example, and you think just about bonuses, set as a function of earnings per share growth, in principle you can have higher growth and higher bonuses in some years. But as compared to the alternative, the way the earnings actually gets restated, you might have done better in certain years, had you just been telling the truth. And you need to net the additional income in the years where you make more against the lost income in other years.

Similarly think about an executive that is both buying and selling in company stock over the time period. Sales at an inflated price will result in incremental profit associated with the fraud. However, if there are purchases, they would be buying into inflation and that loss is going to be netted either against the profits from stock sales and/or against incremental bonus income.

THERESA GABALDON: Pat, how about the effect on options backdating?

DR. PATRICK CONROY: Well, in a backward kind of way SOX actually help create evidence towards backdating. Imagine if you took the price at which options were granted, pre Sarbanes-Oxley and you looked at the price immediately before that, and immediately after that. And the picture looks somewhat like a V. The price before the grant was falling and then the price after the grant was rising and somewhat steeply. When Sarbanes-Oxley was enacted, it changed the rule. Pre Sarbanes-Oxley, the company didn't need to announce information about backdating until 45 days after the close of the fiscal year. Sarbanes-Oxley changed that to two days.

And so if you do that same exercise, which was done by academic study, that you take the days on which the options were granted in post Sarbanes-Oxley and look at the price before and

after, trying to see whether it was granted at a low, it looks almost like a horizontal line. And so there is a stark difference between those two pictures, when they had to report within two days, it gave them very little leeway towards going back in time, finding a lower price and essentially cut it out. There is some slight difference between the companies that did report it within two days and one day. So people I think are always trying to find whatever small gain there is to them.

THERESA GABALDON: That's interesting. Faten, you mentioned of course that there have been lawsuits alleging that some mutual fund advisory fees have been excessive. How does one know what excessive is and who should be deciding those issues?

DR. FATEN SABRY: That's a good question. What excessive fees are have been determined by the court in a similar case of, that's known as the Gartenberg versus Merrill Lynch case, that was in the early '80s where the shareholders of mutual funds sued and alleged first that the board of directors who have breached their fiduciary duty, that the fees that they are paying to the advisors are excessive. And the court rejected that. And the test, and that I'm quoting from the court's decision is that, "the fee schedule has to represent arm's length's negotiations and had to take into consideration all the surroundings or different factors" that have since become known as the Garternberg factors. There are six of them and they include the nature and the quality of the services provided by the advisor, profitability of the fund, economies of scale, the comparative fee structures, how the fees of this fund compares to the relevant comparables and then the independence of the directors themselves. And a lot of the plaintiffs have had the burden of proof and they have had a hard time since then getting some of these cases past the first motion to dismiss the case. But some of them have. And there are currently several ongoing fees litigation where the case I think has gone beyond the motion to dismiss and it's going to be litigated further. But there's no economic definition for excessive fees, other than to say that it has to be the result of an arm's length negotiation between the fund and the advisor.

THERESA GABALDON: And looking at it, in hindsight with a benefit of those factors, basically it tells you whether the process was appropriate?

DR. FATEN SABRY: Yes. I think the process would be appropriate. That makes sense.

THERESA GABALDON: Is this primarily an issue in cases where there is some sort of self dealing that's alleged, or some sort of back scratching?

DR. FATEN SABRY: I think these cases are all filed under Section 36 B, which has to do with, fiduciary duty of the board of directors, that the board of directors didn't their job basically, why they didn't negotiate with the interest of the shareholders in mind, that they didn't get the best fee that they could have, or where you can define the fee, not just the amount paid, but also the kind of services that the advisor would offer, because not all advisors offer the same types and the same quality of services as others.

THERESA GABALDON: Coming back to you, Elaine, you used the term event study in your presentation. I was wondering if you could give me and other listeners more of a feel for what an even study is.

DR. ELAINE BUCKBERG: An event study is a statistical analysis of the stock-price reaction or probably an index or region, price of some other security, to news. So, first of all, one generally starts out by looking at history and performing a regression analysis of the reaction of the stock price to other market indicators. You might look at the market as a whole, some index like the

S&P500 and the NASDAQ. You might also look at its responsiveness to its industry or its quote worth in the market. That gives you an ability based on past experience to predict how the stock would move in response to that day's movements and whatever factors you have looked at, the S&P 500, the industry index, and so on.

Then you look at the day when the news was announced. You can say what history would have predicted it to the stock price movement that day. So let's suppose that you announced terrible earnings on a day that there's also a fabulous unemployment announcement by the Federal government. And so the market overall was up, and your stock had generally correlated positively to the market overall. So that would predict, let's say, a 1% positive return for the stock. But you announce this terrible return, and the stock price actually goes down 3%. You expect up one, you go down 3. So the impact of the market is essentially roughly 4.

That's an oversimplification of the statistical analysis. But that enables you to separate out the movement due to the news from other market movements in the day and really say what is the loss due to the fraud, on that day.

THERESA GABALDON: Patrick, is this the kind of information that you were alluding to when you said that there didn't seem to be much of a market reaction when companies had announced backdating?

DR. PATRICK CONROY: That's exactly right. The work really remains to be done, as though our new company is coming out and constructing what Elaine was talking about, an event study requires really looking carefully at what indexes and what peer companies should be used in order to predict the future price. So that takes lot of work. Right now so far, most people have looked at the raw price reaction. And the raw price reaction is probably somewhat smaller than people would imagine it would be, even though there are outliers. We haven't adjusted those for the market on given days that it went out. So it could come out, like Elaine's example, either way. It could be you announce bad news on a day when the market is down, that's negating the bad effect. Or you could announce it on a day in which the market is up and thus amplifying what looks like the bad effect.

Either way, what you're really trying to figure out, when you disclose something, is it a relevant disclosure to whatever the fraud or the bad act was supposed to be? And in that disclosure was the pressure actually significant? Was it not a random price movement or was it something that you can say was probably tied to the news that was announced on that day.

THERESA GABALDON: Is it possible to engage in some gamesmanship with respect to announcements and knowing how event studies are constructed, that is come out with your bad news on a day when other bad things are happening in the market.

DR. PATRICK CONROY: You could try and do that. Even simpler though is to announce bad news, for instance you could announce that you have to restate due to some accounting problem you had, and on that same day announce that future earnings are going to be lower than you thought they were. And what you'll wind up with this price reaction, which then someone has to go back and try it separate it out. Or alternatively you could announce that you are going to have to restate something on a day when you announce excellent news. And so overall, the price reaction goes up, but the down is being masked by the up. And both plaintiff attorneys and defense attorneys are very good at trying to get their point of view out on what the real price reaction was.

THERESA GABALDON: Sounds like challenging work sorting it out. Well, I think we have time for perhaps one more question. Pat, this one's going to go to you. With respect to the idea of backdating options, but dragging out vesting period, are companies entitled to take into account the time value of the discount that is, it's not worth as much to the employee because it doesn't vest differently, does that have an any effect on the accounting of the issues?

DR. PATRICK CONROY: No, I don't think it actually has an effect on the accounting. But actually there is a group in NERA and many people who work on simply valuing employee stock options because as you point out, they have many different components to them in terms of vesting and registration, that a normal action may not have. It's more complicated to correctly value an employee stock option. There are also different kinds, the straight options, ISO options, and different ways people execute them. So I think there is a discipline that's different from simply valuing plain vanilla options in the market and valuing employee options. And I'm in no doubt that all that will come into play when you are trying to figure out what the effect of the backdating was.

THERESA GABALDON: Elaine, Pat, and Faten, thank you for sharing these presentations from NERA Economic Consulting's Finance, Law and Securities seminar. I can see why they and you are rated top presentations and presenters.

Today's Fireside Chat is now archived by audio tape at [www.sechistorical.org](http://www.sechistorical.org). The transcript of the chat will be ready soon. I'll return in September for our final Fireside Chat for 2006 talking with Donald C. Langevoort, Thomas Aquinas Reynolds Professor of Law at Georgetown Law Center, a member of the Society's Board of Advisors and the inaugural moderator for the Fireside Chats in 2004. Donald will discuss behavioral economics, the links between psychology and economics, and how cognitive and emotional processes influence our rational or irrational economic decisions. It promises to be a very interesting discussion. Please join us on Tuesday September 19th at 3:00 p.m. Eastern Time at [www.sechistorical.org](http://www.sechistorical.org). Thank you for being us with today.