# The index fund approach: Tracking the market

## An interview with John C. Bogle, chairman, The Vanguard Group

*The goal of many individual investors is to beat the market. A large number, however, don't—particularly when the costs of trying to do so are considered. One alternative is to apply the old adage, "If you can't beat 'em, join 'em."*

*The index fund concept allows investors to do just that. A portfolio of stocks is constructed to mirror a market index, such as the Standard & Poor's 500. Because stocks are not bought and sold on a continuous basis, transaction costs are reduced substantially. And there is no advisory fee, since there are no active management decisions that must be made. Because the costs are so low, index funds have the ability to closely track the index they are mirroring. The only risk that an index fund investor undertakes is market risk—the risk that the stock market itself will lose value. All other risk, such as following a strategy or picking a fund that underperforms the market, does not exist.*

*John C. Bogle, chairman of The Vanguard Group, has been one of the prime movers in making the index fund concept available to individual investors. The Vanguard Index Trust was started in 1976 and it mirrors the S&P 500. Not surprisingly, its performance closely tracks the index: During 1985, the Vanguard Index Trust had a return of 31.2%, compared to 31.6% for the Standard & Poor's 500. Expenses are also very low for a common stock fund: 0.28% during 1985.*

*Mr. Bogle agreed to discuss the index fund concept with the* Journal. *The interview took place in early December 1986.*

*The Vanguard Index Trust is part of The Vanguard Group of Investment Companies, Vanguard Financial Center, Valley Forge, Pa. 19482; 1-800-662-SHIP.*

*What is the Index Trust?*

Vanguard Index Trust is a no-load index mutual fund, which is designed to replicate the performance of the Standard & Poor's 500 stock index on a consistent basis. It has no investment adviser and therefore pays no advisory fee. It owns all 500 stocks in the S&P 500 index, weighted according to their weightings in the index. Its performance has paralleled the index very closely over the 10 years it has been in existence.

*Why did you set up the Index Trust, and why would an individual investor want to use an index fund approach to investing?*

We set up the Index Trust because we wanted to prove that indexing could work as a practical business matter. It's all right to talk about the market index as a theoretical portfolio that has no transaction costs, no need to price the securities every day, no need to handle shareholder accounts, and no need to raise cash. The only way you can really see what an index fund can do is to put one in business. And so we did that.

The idea was that it would track the index closely enough to do what the index itself has done over the last 15 or 20 years—and that is to outperform on average over 65% of the professionally managed equity portfolios on a long-term basis. The idea was to get a low-cost vehicle—hence a no-load fund—and a low expense ratio vehicle—hence no advisory fee—that would come as close to tracking the index as would be possible.

*The index fund concept is popular among the institutions, such as the major pension funds and endowments. However, one of the arguments they use to justify the use of an index fund is that their portfolios are so large they can't possibly beat the market, because they are the market. Individual investors' portfolios, however, are smaller. Can they compete successfully against the market? Your index fund concept would argue "no."*

Individuals can compete successfully in the market—just as successfully as the institutions. But when you cut through it all, if there is a return of X in the market, investors collectively will divide up X minus Y, with Y being the cost of being in the market, such as commissions, advisory fees, spreads—the whole works. The fact of the matter is, if the market itself provides a 10% return, investors will divide up closer to a 9% return. If an index fund can come in and give investors a good fraction of 10%—let's say 9¾% because it has operating costs—it will outpace most of the managed accounts. And that is exactly what has happened.

*In other words, some individuals will outperform the market, but others will underperform it. And the sum total is the market return minus costs.*

That's correct.

*What are the Index Trust's costs due to?*

Our operating costs run about 0.25%—the cost of getting the price in the paper, handling shareholder accounts, and the allocated share of Vanguard's costs. It is the lowest cost mutual fund that I have ever seen.

The other cost in an index fund is the cost of having a cash position, because people are going to be putting money into the fund and taking money out of the fund. When money comes and goes, and when securities in the index change, we have to buy and sell securities. This produces transaction costs, which in our experience has come to about 15 to 20 basis points. [A basis point is 0.01%. Commissions do not show up in expense ratio figures, but reduce net asset value.] So if you put that figure on top of the 0.25% operating costs, you are looking at a shortfall in terms of performance versus the S&P 500 of about 0.40%. And that is in fact about what we have been able to achieve.

*Your own Windsor Fund is one of the better arguments against an index fund approach. That fund has outperformed the market over a long period of time. The Windsor Fund itself is closed to new investors, but why shouldn't investors put their money in the other Windsor-type funds of the mutual fund industry?*

A lot depends on the investor's objective. If he can pick the very best-performing fund, then the index fund is going to pale by comparison. But the odds are probably equally great that he will pick the worst-performing fund, in which case the unmanaged index fund will look like it is managed by a genius.

I would argue that an individual investor would want to do both. He can put part of his equity money in a completely predictable fund—stocks go up, he goes up; stocks go down, he goes down. There is no one interposed between him and the stock market. An active manager can make the performance better, to be sure, but that manager can also make performance worse. Probably some combination of an index fund and a more actively managed fund is something that is worth thinking about.

*You are suggesting an approach similar to the core portfolio concept, which is to invest the bulk of the equity portfolio in an index fund, and then use specialty managers to add extra value. For an individual investor, the specialty managers would be actively managed mutual funds.*

Sure. There are a lot of ways to do it. There are no simple answers. For example, you may want an 80% indexed core portfolio, and 20% in a more actively managed fund, such as the Vanguard Explorer, which is a very aggressive fund. On the other hand, if you invested in a fund such as Windsor, which is fairly conservative, you might want 80% in Windsor and 20% in the Index Trust—the opposite ratio. Windsor is going to parallel the market to a much more predictable extent than Explorer.

*You mentioned earlier that the Index Trust is a market-weighted fund. I have read that Vanguard was considering an equal-weighted fund. What would be the advantage of this type of fund?*

Actually, that's not true. We have never seriously considered an equal-weighted fund. What we are doing is something a little bit different. We are starting the Vanguard Quantitative Portfolio, a computer-managed fund that is oriented toward the index. In other words, the computer will grind out, on the basis of 28 different models, which stocks seem to be the most attractive and which stocks seem to be the least attractive. The fund will not just go out and buy those stocks. Rather, it will increase its S&P weighting in the attractive ones and reduce the S&P weighting in those that are not attractive. Our objective is to outperform the market by 2% a year net of all expenses. Whether this can be done . . . we believe it can be done, but we're not certain.

*Does the computer get an advisory fee?*

The computer firm does. The adviser is going to be

Franklin Portfolio Associates, in Boston. It has been doing this kind of work for seven or eight years. The advisory fee is oriented toward the objective I just described. The fee will be very low for this business, which is 0.30%. If in fact we outperform the index after all costs by 2% a year, that fee will be 0.50%. If we underperform the index, it will be down to 0.10%.

*The Index Trust is perfect for market timers, but you emphatically discourage that. Why?*

They would be the goose that killed the golden egg. We have a fund that has been performing very well. It has been attracting the right kind of investors—people who are in there for the longer-run. If market timers were to come in and put in a lot of money on Monday and take it out on Tuesday, the fund would be buying a lot of stocks on Monday and selling a lot of stocks on Tuesday. That pyramids your transaction costs, and you can't set out to do what you wanted to do in the first place.

*You also recommend against that for an individual investor's strategy in your prospectus.*

Yes. Because it can't be done, in my opinion. No matter what anyone says, the security markets in the U.S. are highly efficient [stocks are correctly priced based on all publicly known information]. What you are doing when you go in and out of the markets is neither more nor less than simply guessing. You would think that an investor would be right half of the time and wrong half of the time, which would probably not be too bad, except for two things. One, it is going to cost money to move in and out; and two, the market-timing investor, like all the rest of us, tends to get a little bit carried away with the emotions of the moment. We all feel better when the market is up, and worse when the market is down. Well, if you are taking action on that, it follows that you are buying stocks when the market is high and selling stocks when the market is low—which is one reason the market swings high and low.

I think investors' emotions get in the way of an intelligent investment program.

*Have you considered establishing funds based on other indexes, such as a world index or a small stock index?*

Our second index fund is just about to be offered, which is a bond index fund. We will be using the Salomon Brothers Broad Investment Grade bond index, which is an index of about 4,700 bonds in a $1.7 trillion bond market. That index, analogous to the S&P 500 index, has outperformed 81% of all of the professionally managed bond accounts over the last six years, which is as far back as the track record goes. The argument in favor of a bond index fund is the same as the stock index fund concept, but with bonds rather than stocks. We will also have no adviser for the fund, and it will operate at an expense ratio of about 0.25%.

We have talked a lot about an international fund. It can be made to work, although my own personal view is that it is difficult to have an international index fund that will come as close to matching the international index as a U.S. index fund comes to matching the S&P 500 index for a variety of reasons. The international markets are not as liquid, and transaction costs are higher than in the U.S. And, for example, there are some securities in Japan that can't be bought by outside companies.

There is nothing the matter with an international index fund idea, and there is nothing the matter with a small stock index fund except, I suppose, the fact that there isn't any small company index, so you won't know whether you are winning or losing.

It seems to me that the type of person attracted to index funds is one who wants relative performance predictability. But I would define it as relative to the stock market, and not relative to sectors popular at any one moment. For instance, it is not relative to automobile stocks, which would argue for an automobile index fund, or biotechnology stocks, which would argue for a biotechnology index fund. That is what many of these sector funds are—they are index funds. People don't call them that, and they pay very large advisory fees for them. But they tend to be just an index of what is going on in that industry.

*Do you use index futures in the fund?*

We do not, but we are considering going to shareholders and asking for approval to use them. We have not yet done anything in that area, because when the fund came out, they did not exist.

If we did use them, they would be used only as a liquidity medium. In other words, if we had cash that came in, and we were worried that it would go out again on a short-term basis, we would use the cash to buy the futures rather than the stocks. We would not use them on a leveraged basis. It would strictly be a portfolio management technique that is useful to us only as it is cost effective.

For instance, if you have a large order—$3 million on a given day—you might invest it immediately in a future and take a little bit of time to reduce the future and buy the actual stocks. The transaction costs in this approach would be less.

*Can index futures be used in an individual investor's strategy in using the index fund? Or does the fact that you do not allow telephone switching prevent this?*

We do not allow regular switching. We would not allow someone to stay in the fund if they make more than three or four switches a year. So such a strategy couldn't be followed.