# FREQUENT BUYER PROGRAMS

by Randall G. Chapman'

Marketing premises, cost and reward structure issues, differential advantage considerations, and data base benefits of frequent buyer programs are examined. Cost structure and differentiability are seen as the two key influencers of the potential efficacy of frequent buyer programs. It is proposed that frequent buying programs would be especially useful competitive marketing instruments for marketers in industries characterized by: (i) relatively undifferentiated competitive brands with low switching costs and associated low brand loyalty; (ii) overcapacity (especially on a seasonal basis) with low marginal costs associated with the prizes offered as rewards to frequent buyers.

requent buyer programs seem to represent almost ideal marketing segmentation and target marketing tools. Their benefits may be targeted primarily to heavy users, a buying segment of obvious interest to all vendors. However, in practical terms, such programs seem more often than not to be instituted in response to competitors' initiatives, rather than as a thoughtful component of an on-going marketing program. And, perhaps more importantly, frequent buyer programs seem to be launched sometimes without regard for whether they are really appropriate in a particular product or service category.

To buyers, frequent buyer programs may be viewed in emotional as well as pragmatic, reward-oriented terms. Buyers may view frequent buyer programs as just recompense for faithful allegiance to a single supply source. The withdrawal or expiration of such programs (real, threatened, or perceived), or taxation authorities' signalling of attempts to treat such benefits as taxable income (for example, in the case of airlines frequent flyer programs), may raise the vocal ire of committed frequent buyer program members. For firms with a major stake in

<sup>\*</sup> Randall G. Chapman is a Professor of Marketing at Boston University.

them, frequent buyer programs can become a very prominent part of their businesses. For example, in 1991, United Airlines was reported to have had 7 million frequent flyer miles outstanding and to have awarded some 1.6 million free flights (Grosvald, 1992).

The North American airline industry is perhaps the most visible user of frequent buyer programs, with at least some observers going so far as to proclaim frequent flyer programs as one of the most successful marketing innovations in history (Levy, 1985). However, airline frequent flyer programs are not the only notable variety of frequent buyer program. Hotel and automobile rental firms employ such programs, typically in affiliation with one or more airlines' programs. In an historic perspective, retailers' green stamps programs are perhaps the most readily identifiable example of frequent buyer programs.

Outside of the travel industry, some consumer packaged goods firms are developing membership programs where purchases of selected brands in a wide range of product and service categories receive credits toward general merchandise prizes. Broad based lovalty management programs across non-competing brands and enterprises also exist. Air Miles, a modern-day trading stamps program, permits customers to accumulate credits by purchasing more than 120 products and services from almost 40 participating sponsors (Levin, 1992). By accumulating and submitting proofs-of-purchase, members earn miles which may be redeemed for tickets on American Airlines. United Airlines, USAir, and Air Canada. As with brand-specific frequent buying programs, sponsors financially participate in the Air Miles program with the joint expectations of increased revenues and levels of brand loyalty. Credit cards are another area of widespread frequent buyer program usage. Citibank has, for some time, included a purchase points program within its credit card offering. GM's recently launched MasterCard offers 5% credits (to a maximum of \$500 per year) which may be accumulated for up to seven years and applied to the purchase or lease of GM automobiles. GM has issued some two

million of its no-fee credit cards in the first three months of its existence (McMenamin, 1993).

"[F]requent buyer programs seem to be launched sometimes without regard for whether they are really appropriate in a particular product or service category."

Why are frequent buyer programs used? When will they be most advantageous? When will they be irrelevant? What is the marketing theory behind the existence and prevalence of frequent buyer programs? Are they gimmicks, or sound marketing devices? This paper addresses these and related issues. This paper does not seek to describe the history, ethics, pros and cons of frequent buyer programs, anti-competitive threats raised, or management attitudes toward such programs. Others have performed these tasks admirably. See the articles by Stephenson and Fox (1987 and 1992), Deane (1988), Grosvald (1992), and Tretheway (1989), respectively, for further background and details of these aspects of frequent buyer (flyer) Rather, the concern in this paper is to identify the programs. marketing theory which underlies the existence of all frequent buyer programs and then, based on that theory, to identify obvious stresses, strains, and practical difficulties that arise in implementing such promotional programs. Most of the recent literature on frequent buyer programs is actually about a single type of program — frequent flyer programs. A major purpose of this paper is to generalize the ideas and principles which underpin all frequent buyer programs, of which frequent flyer programs are the best known and most prominent example.

# **Definition of Frequent Buyer Programs**

It is important to carefully define what a frequent buyer program is. and what it is not. The following definition is proposed: A frequent buyer program is a promotional program that provides for prizes, incentives, and price discounts to buyers based on cumulative purchases from a single or multiple vendors. The cumulative purchase component of this definition is especially notable. A frequent buyer program does not involve volume discounts, since volume discounts are based on the volume of purchases at a single point in time. accumulation of purchase activity (in dollar or "point" terms) may be finite (limited to a certain period of time) or infinite (with no fixed limit of time, but with the vendor typically retaining the right to change the program at any time with appropriate notice provided to buyers). Since prizes may be monetarized in terms of their equivalent monetary value, frequent buyer programs are essentially price discounts based on cumulative purchases. For airlines and hotels, the prizes are typically free travel or hotel stays, representing an obvious discount over regular prices.

Some other relevant aspects of frequent buyer programs include the following:

- Someone, typically the vendor, must keep track of buyers' cumulative purchases, to determine when buyers earn subsequent price discounts or rewards. By tracking purchases, the vendor generates a data base that has a variety of other possible advantages. If customers are required to track their own purchases, the record-keeping burdens presumably serve to reduce the utility associated with program participation.
- Prizes are typically more product or service of the vendor. Since the vendor faces much lower costs than "full retail price," vendor cost may be much smaller than the perceived value derived by customers. Of course, the issue of self-cannibalization of full-price sales is of

concern. Even the otherwise empty airline seat redeemed by a frequent flyer is not without cannibalization ramifications, since some frequent flyers would have paid the full price even in the absence of the free ticket.

Cumulative purchases normally accrue to the buyer or user.
Purchase credits typically cannot be pooled across family members or corporate associates regardless of who actually pays for the product or service.

## The Marketing Premises Underlying Frequent Buyer Programs

The general marketing premise which underlies frequent buyer programs is that of differential advantage. If customers value frequent buyer programs, then vendors offering them will have marketing advantages over those who don't. However, things are really more complicated than this simple marketing principle. If there are limited ways to differentiate a product or service, then a frequent buyer program may encourage buyers to continue to purchase a single brand rather than switching around from brand to brand. And, if all brands are seen as being similar by customers, then any one brand will do about as well as any other brand in meeting customers' buying requirements. Thus, one consequence of limited differentiation is low Frequent buyer programs may be viewed switching costs. simultaneously as an effort to add value to a product or service and also as an effort to increase switching costs associated with changing brands.

With sophisticated customer tracking programs, heavy users of frequent buyer programs may be identified. Heavy users may then be targeted to receive extra bonuses (for example, first-class upgrades, mileage bonuses, separate check-in procedures, and dedicated reservation lines) for continued high levels of purchase activity and, thus, continued loyalty. As Grosvald (1992, p. 34) notes, "if you're a

Northwest Gold member and are constantly being upgraded to first class and receiving mileage bonuses, what's the benefit of flying some other airline?" Light users may never reach minimum reward and prize levels, particularly if expiration dates on cumulative purchase points exist. Thus, a principal and obvious benefit of frequent buyer

"If there are limited ways to differentiate a product or service, then a frequent buyer program may encourage buyers to continue to purchase a single brand rather than switching around from brand to brand."

programs lies in their ability to be offered simultaneously to all buyers but yield maximum benefits to heavy users, always an important customer group.

Since frequent buyer programs are, by definition, cumulative in nature and design, they cannot be viewed merely as short-term promotional vehicles. Rather, they should be viewed as part of a marketer's long-run marketing strategy. With rewards of price-discounted or free units, one view of such frequent buying programs is that they are just a form of deferred price discounting. Normally, the discounts accrue to the user, not the purchaser (for example, the business traveler whose fare is paid by the traveler's employer). The separation of the user and the purchaser, and the assignment of the frequent buying rewards to the user, may have obvious dysfunctional implications. The accumulation of the frequent buying rewards to the user, rather than the purchaser, may induce uneconomic — from the purchaser's viewpoint — brand choices to increase the user's reward potential. For example, business flyers may go out of their way to use

an airline with a particular frequent flyer program, even if less expensive airline alternatives exist.

An often stated goal of such frequent buying programs is to encourage heavy users to be brand loyal, or to be more brand loyal. Frequent buyer programs are designed to generate incremental revenue by shifting relatively indifferent customers toward a particular brand, even though the brand may be somewhat less desirable (excluding frequent buyer program benefits) than its competitors on a particular purchase occasion. The precise kind of behavior of interest is described by Grosvald (1992, pp. 31 and 33) for frequent flyer programs: "If you want to fly from San Francisco to New York and your preferred airline has a 9 A.M. flight, but you really want to leave at 8:30 A.M., you'll probably accept the 9 A.M. departure. Frequent flyer program members, especially those very close to an award, will often wait an hour or two for a flight on their preferred airline even when a competitor has a more convenient service." It follows that switching costs must be relatively low in such a market, or else brand loyalty would be observed as a rational risk-reducing and switchingcost-reducing buying strategy. Low switching costs might occur when there are small perceived differences across competing brands or observed price differences across brands are not large. Thus, frequent buying programs represent a potential differentiating feature in commodity-like markets.

In differentiated markets, preferred offerings (even with premium prices) have a competitive advantage and do not necessarily need to resort to frequent buying programs to attract and retain customers. For example, a high-quality golf course by a name-brand designer with a desirable location hardly needs a frequent buyer program to encourage repeat patronage. Since the offering (course and location) is valued and distinctive, the golf course itself is sufficient attraction to existing and prospective customers.

# Frequent Buyer Program Rewards

Frequent buyer programs reward customers whose cumulative purchases reach prescribed levels. There may or may not be a time period specified during which the purchases must be cumulated. The purchase amounts needed to reach the best reward levels typically vastly exceed the potential purchases by any single buyer in any single time period.

The frequent buyer prize structure may need to be non-linear (increasing rewards with increasing cumulative purchases), to offset variety seeking behavior. In the absence of such a non-linear reward structure (for example, 20,000 miles yields one free economy-class ticket, 40,000 miles yields two free economy-class tickets, and 60,000 miles yields two free first-class tickets), even heavy users may not go to extreme lengths of inconvenience to patronize only a single brand. Indeed, if all competitors in a category have frequent buyer programs with linear reward structures, there is little incentive to stick with just a single brand. With a linear reward system, rewards accrue equally with all competitive brands, so buyers would not need to worry about which brand they chose. Non-linear reward structures have the potential to be possible attractions to encourage the heavy users who may belong to many frequent buyer programs to concentrate purchases with a single vendor. The presence of time limits for frequent buyer program point accumulation would offset customers' tendencies to switch around among competing brands. However, unless duplicated by all competitors, such time limits presumably would detract from a specific brand's frequent buyer program in the first instance.

While sharing some commonalities with the more well known volume discount plans, the cumulative nature (across a number of time periods) of frequent buying programs is a notable distinguishing feature. A buyer may not be restricted to purchasing only a single brand or product form to accumulate credits in a frequent buying program. Purchases from the full range of brands or product forms

offered by a vendor may qualify for cumulative purchase credit (for example, the many different flights of an airline all receive mileage credit). The rewards are usually in the form of free or heavily discounted units of the product or service. For services (such as airlines), the usage of such free or discounted units may be restricted to seasons or time periods of non-peak demand.

Reward structures which feature free or discounted units would be expected in industries with excess capacity, either seasonally or generally. In the case of general overcapacity in an industry, a frequent buyer program might just be another way to attempt to increase aggregate demand. The more usual case would be in the high-fixed and low-variable cost industry (such as the airline industry) where there is overcapacity on a seasonal basis, with little marginal cost associated with its use by buyers, and where such a frequent buying program would just represent an attempt at demand shifting from periods of traditional high demand to excess capacity periods. For airlines, with very high fixed costs of operating flights and low marginal per-passenger costs of servicing each sales unit, such programs may be useful in filling up otherwise unused capacity, in low demand seasons.

To keep program members' interest high, to be competitively responsive, and for demand-smoothing reasons, frequent buying program sponsors may need to refresh their reward structures periodically as well as offering special reward opportunities. Among the interesting new developments in airline frequent flyer programs are: (1) the use of dual award structures, requiring much higher mileage accumulation for unrestricted access to free airline travel but sharply lower levels of mileage for highly restrictive access (to routes, to seat allocations, and to time-of-year) to free airline travel; (2) non-airline travel awards selected from merchandise catalogs, which is directly analogous to green-stamp programs; and, (3) special event rewards such as participation in sports events such as golf pro-ams,

tickets to sports championships like the Super Bowl, or airline cockpit simulator access.

# Cost Structure and Differential Advantage

Two major considerations influence the relative efficiency and effectiveness of frequent buyer programs as a marketing device: cost structure and differential advantage possibilities. Only in certain cost-structure and differential-advantage situations are frequent flyer programs sensible.

It is not by accident that frequent buyer programs are especially prevalent among airlines, hotels, and rental car companies. All of these businesses are characterized by high fixed costs and low variable costs, highly competitive businesses with relatively few major companies holding the vast majority of the market share in the business, and quite similar marketing programs used by all major competitors. The "low" variable costs are especially notable. Here, "low" may effectively be thought of as "zero" opportunity costs in some circumstances. If a frequent buyer prize (a free trip, a free hotel stay, or a free car rental) is redeemed at such a time as to not displace a regular paying customer, the effective cost of the prize to the provider is near zero. The benefit to the prize holder, however, may be substantially above zero (proving once again that costs of providing goods and services has no direct relevance to its value to customers).

Cost structure and differential advantage interact with regard to the attractiveness of frequent buyer programs. Some restaurants have initiated frequent buyer programs, even though they might have numerous sources of enduring differential advantage (for example, menu, location, and service quality). Of course, since customers seek variety in dining experiences, they will generally want to frequent various restaurants — not just one. Cost structure issues mitigate the potential attractiveness of frequent buyer programs to restaurants,

however, given the relatively high variable cost associated with the free meal. Of course, if only the meal itself is free and not the associated beverages, it is possible that the high margins associated with alcoholic beverages might still make such "free" meals in restaurants profitable.

Are intangible services more likely candidates for frequent buyer programs rather than tangible products? Does tangibility have some special influence on the efficacy of frequent buyer programs? Not necessarily. Although most of the common examples of frequent buyer programs are relatively intangible services (airlines, hotels, and rental cars) rather than relatively tangible products, cost structure and differentiability considerations explain this. With low variable costs (say, for cigarettes or drugs), frequent buyer programs are feasible—as long as differentiation across competing brands is low or non-existent. However, cigarettes and drugs are usually thought to be highly differentiable if only in terms of customers' brand perceptions, and thus frequent buyer programs are probably not appropriate even though their cost structures are favorable (high fixed costs and low variable costs).

If users are not the actual payers, the key components of differential advantage may shift away from price-related considerations and toward other factors. For example, such a third-party payer issue arises in connection with business travel and frequent flyer programs. Since the user is not necessarily the payer, the user's price sensitivity is expected to be lower. When someone else is footing the bill, the user presumably pays less attention to price and more attention to other things in the selection of a vendor. Of course, one of the other things here would be frequent flyer program terms, conditions, and reward structures.

If there are other relevant sources of differentiation that are highly valued by customers, why not use them? A frequent buyer program is just one possible benefit that buyers derive from using a particular vendor. In highly differentiated markets, buyers may go to

considerable lengths to identify and purchase brands that most closely fit their buying requirements. However, if all airlines or all hotels are viewed as being pretty much the same (that is, if they are homogeneous commodities), then other benefits — such as frequent buyer programs — will be weighed more heavily by customers.

Based on this discussion, cost structure and opportunities for differential advantage both influence the efficacy of frequent buyer programs. The following chart summarizes this discussion:

Number of Possible Sources of Differential Advantage

Cost Structure

	Few	Many
High Fixed Costs and Low Variable Costs	Frequent Buyer Programs Are a Viable Possibility	Depends on Customer Trade-Offs; Only If "Free" Prizes Are Important
Low Fixed Costs and High Variable Costs	"Free" Prizes Are Too Costly, Given High Variable Costs	No Apparent Reason To Offer "Free" Prizes, Since There Are Lots of Other Ways To Compete

High fixed cost and low variable cost structures in markets where there are only limited possibilities for achieving differential advantage represent the best opportunity for successful frequent buyer programs. Other combinations of cost structure and differentiability are not apparently fertile ground for frequent buyer programs.

# Unexpected Consequences of Frequent Buyer Programs

Frequent buyer programs can have unexpected consequences for the sponsor. They can lead to changes in product and service design. For example, United Airlines acknowledges increasing first-class cabin seats

on some aircraft partially to accommodate upgrading MileagePlus flyers (Marini, 1992). Frequent buyer programs can even lead to more fundamental changes in marketing efforts, marketing management, and information management. For example, supermarket frequent shopper programs require the integration of sophisticated computer hardware and software, scanner data, direct response marketing, and promotion planning (Lawmaster and Stewart, 1991). Joint participation in frequent buyer programs by non-competing enterprises arise as obvious competitive marketing possibilities (Shulman, 1989 and Levin, 1992). Finally, frequent buyer programs are natural direct marketing tools which draw marketing resources away from general purpose mass media advertising and toward targeted promotion efforts (Lawmaster and Stewart, 1991).

As originally constituted, frequent buyer programs impose significant record-keeping requirements on the vendors who offer them. Data entry, processing, storage, software development, and hardware costs all accrue to the vendors. These costs, which no doubt resulted in early efforts of some airlines to charge a fee for joining their frequent flyer programs, represent one effort to have the customers pay some of the direct frequent flyer program administrative costs. Air Canada, for several years, charged \$20-\$30 to initiate membership in its frequent flyer program. More recently, such membership fees are notably absent from the frequent flyer programs of all major airlines, presumably due to competitive forces. The recently introduced frequent flyer program of American Express does have an annual fee, but its benefits have a distinctiveness — users may redeem mileage credits for tickets on an unusual number and mix of airlines.

After developing data base management systems, airlines learned a valuable lesson — their data bases had additional value to them and to other firms. For example, such a detailed customer data base might be used for marketing analysis and research, targeted private (non-public) promotions to fine tune yield management systems and capacity usage, and other commercial purposes (direct marketing of related

andancillary products and services, direct mailing list rental). Even if all competitors also have frequent flyer programs, the data base benefit may be large enough that competitive vendors are each motivated to continue to offer frequent buyer programs.

# "Only in particular situations are frequent buyer programs likely to work well..."

The interrelationships between frequent buyer programs and other marketing program elements are notable. For example, airlines have targeted special price promotions for weekend flights to customers who are able to fly on short-notice. They mail the details of such price promotions to customers 7-10 days prior to the availability of the promotions. Undoubtedly, their yield management systems have identified likely empty seat patterns, and airlines promote them to subsegments of their frequent flyers. Note that such promotions might not even be noticed by competitors, since they are advertised on a direct-mail basis, not through traditional "public" communications channels (for example, newspapers).

The targeted promotion aspects of frequent buyer programs will be of most value when such promotions cannot easily be copied by competitors. As Kearney (1989, p. 68) notes: "If United, the only airline to serve all fifty states, wants to sponsor a contest offering the winner a free trip to each of the states over a period of years, it would be difficult for the competition to duplicate."

By their nature, frequent buyer programs have the potential to raise a variety of ethical issues. The potential for abuse in frequent flyer programs has been widely noted (c.f. Stephenson and Fox, 1987; Deane, 1988; Hu, Toh, and Strand, 1988; and Fox and Stephenson, 1990). For example, according to an editorial in *The Wall Street* 

Journal (Kinsley, 1985): "Frequent flyer plans are an ingenious system for giving the benefits of competition to the person who spends the money, rather than the person whose money is being spent. What we are witnessing is a massive, open, and widely successful campaign to corrupt the morals of the corporate class." However, with the exception of the third-party payer issue, frequent buyer programs are really just another possible marketing program element which buyers must implicitly weigh when choosing among alternative vendors on each purchase occasion. Rational buyers will choose vendors who buyers perceive offer the best overall buying conditions and circumstances. Frequent buying programs are but one element of the overall set of considerations of relevance to buyers. Of course, if everything else is approximately equal, the thoughtful buyer would be non-rational to choose any offering other than the one with the most attractive frequent buyer program. However, all product and service categories do not fall into the everything-else-is-equal, commodity-like situation.

#### Conclusion

On a marginal-cost versus marginal-benefit basis, once an information system infrastructure has been put in place, the administrative costs to continue a frequent buyer program may be relatively modest when expressed in per-customer terms. However, frequent buyer programs only have limited applicability. Only in particular situations are frequent buyer programs likely to work well—in industries characterized by high fixed and low variable costs, when few other sources of differential advantage exist, and when overcapacity exists. If current demand exceeds current capacity, there is little incentive to develop marketing programs of any kind designed to further stimulate either industry-wide or brand-specific demand.

Changing market forces and competitive patterns can alter the costbenefit balance associated with launching frequent buyer programs. As products and services move through their life cycle and progress from being relatively unique to being relative commodity-like (from the perspective of customers), the potential benefits of frequent buyer programs will tend to increase. Commodity-like status is one key signal of the potential efficacy of frequent buyer programs.

Overcapacity and low marginal cost structure situations are especially characteristic of service industries, so the widespread use of frequent buying programs by airlines, for example, is not unexpected. Capital intensive service industries have difficulty in adjusting capacity to meet short-run demand fluctuations, since services cannot be inventoried. This is why efforts to time-shift demand, in general, and the redemption of frequent buyer program awards, specifically, are so important in service industries. With time-varying demand (for example, seasonality), overcapacity and undercapacity demand situations inevitably arise. (Few businesses can arrange capacity to service peak demand.) Through time-shifting marketing programs — including redemption constraints on frequent buyer program awards — service businesses seek to move some high-season demand to historically low-demand time periods.

A number of researchable issues arise with regard to frequent buying programs. The key issues concern the conditions under which such programs might be particularly attractive (or unattractive) to certain kinds of businesses. Here, "conditions" refers to market contexts (demand levels, market growth rates, degree of brand loyalty present in the market, vendor switching costs, and demand elasticities), market segmentation structure (relative and absolute sizes of light and heavy user sub-segments), competitive market structure (number of competitors and their positioning), cost structure (high and low variable cost situations, high and low fixed cost situations), and the presence and magnitude of experience curve effects on costs. Some specific empirical issues of interest include:

- What are the economic trade-offs to marketers in designing a frequent buying program? What is the "optimal" type of frequent buying program?
- What are the economic trade-offs to buyers associated with participating in frequent buying programs?

Additional published empirical studies of the behavior of frequent buyers, like those of Toh and Hu (1988 and 1990) — but in milieu other than airline frequent flyers — would be most valuable. Research on these and related issues would be of value to managers of frequent buyer programs as well as to those contemplating instituting such programs.

#### REFERENCES

- Deane, Richard H., "Ethical Considerations in Frequent Flyer Programs," *Journal of Business Ethics*, Vol. 7, No. 10 (October 1988), pp. 755-762.
- Fox, Richard J. and Frederick J. Stephenson, "How To Control Corporate Air Travel Costs," *Business* (July-September 1990), pp. 3-9.
- Grosvald, Steven, A., "Frequent Flyer Programs: The Inside Story," *OAG Frequent Flyer* (November 1992), pp. 28-34.
- Hu, Michael Y., Rex S. Toh, and Stephen Strand, "Frequent Flyer Programs: Problems and Pitfalls," *Business Horizons*, Vol. 31, No. 4 (July-August 1988), pp. 52-57.
- Kearney, Terrence J., "Frequent Flyer Programs: A Failure in Competitive Strategy, With Lessons For Management," *Journal of Services Marketing*, Vol. 3, No. 4 (Fall 1989), pp. 49-59.
- Kinsley, Michael, "Greed Gets Most Mileage Out of Airline Credits," *The Wall Street Journal* (October 10, 1985), p. 33.
- Lawmaster, Susan and David W. Stewart, "Frequent Shopper Programs: Supermarkets' New Tool to Stimulate Store Loyalty," *Journal of Promotion Management*, Vol. 1, No. 1 (1991), pp. 55-76.
- Levin, Gary, "Air Miles Flies Slower Than Expected," *Advertising Age* (November 15, 1992), p. 31.
- Levy, Robert, "Flap Over Frequent Flyers," *Dun's Business Month* (January 1985), p. 49.

- Marini, Richard A., "Frequent Flyer Programs: The Upgrade War," *OAG Frequent Flyer* (November 1992), pp. 36-39.
- McMenamin, Brigid, "The Great Giveaway," *Forbes* (January 18, 1993), p. 96.
- Shulman, Richard, "Building a Bridge For Professional Partnerships," Supermarket Business (May 1989), pp. 19-20.
- Stephenson, Frederick J. and Richard J. Fox, "Corporate Attitudes Toward Frequent Flyer Programs," *Transportation Journal*, Vol. 27, No. 1 (Fall 1987), pp. 10-22.
- Stephenson, Frederick J. and Richard J. Fox, "Corporate Strategies For Frequent Flyer Programs," *Transportation Journal*, Vol. 32, No. 1 (Fall 1992), pp. 38-50.
- Toh, Rex S. and Michael Y. Hu, "Frequent Flyer Programs: Passenger Attributes and Attitudes," *Transportation Journal*, Vol. 28, No. 2 (Winter 1988), pp. 11-22.
- Toh, Rex S. and Michael Y. Hu, "A Multiple Discriminant Approach To Identifying Frequent Flyers in Airline Travel: Some Implications For Market Segmentation, Target Marketing, and Product Differentiation," *The Logistics and Transportation Review*, Vol. 26, No. 2 (June 1990), pp. 179-197.
- Tretheway, Michael W., "Frequent Flyer Programs: Marketing Bonanza or Anti-Competitive Tool," *Journal of the Transportation Research Forum*, Vol. 30, No. 1 (1989), pp. 195-201.