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Social Marketing as a Framework for Recruitment: Illustrations From the REACH Study

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Abstract

Objectives—Recruitment is often the most challenging aspect of research with older persons. Social marketing—applying marketing techniques to influence the behavior of target audiences to improve their welfare—can help researchers identify factors

Methods—Illustrations of social marketing principles are provided from the Resources for Enhancing Alzheimer’s Caregiver Health project, a national Alzheimer’s caregivers study that targeted ethnic and racial minorities.

Results—Social marketing principles—the six Ps of participants, product, price, place, promotion, and partners—provide a theoretical framework for organizing and planning recruitment activities, including developing varying strategies to define the target audience (participants), develop the intervention (product), manage time and trouble (price), target the audience, improve accessibility (place), promote the study, and develop and work with partners.

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Discussion—Strategies to enhance recruitment are often undertaken without a comprehensive plan. A social marketing plan provides a framework to map out the steps in recruitment that will be needed and to plan for allocations of time, staff, and resources.

Keywords

social marketing; patient selection; cultural diversity; Alzheimer’s disease; aged

Recruiting Alzheimer’s caregivers into research studies can be particularly challenging (Picot, Stuckey, Humphrey, Smyth, & Whitehouse, 1996; Young, Solakumni, Young, & Peters, 1996). For caregivers, participation in research studies is especially difficult because of such factors as care recipient frailty, lack of transportation, inability to afford or find someone to stay with the care recipient, and lack of time. Other groups, including older persons and racial and ethnic minorities, may also present difficulties in recruiting. Models for enhancing participant recruitment and retention generally focus on strategies for integrating academic research programs into the community of interest. Both the participatory action model (Reed, Foley, Hatch, & Mutran, 2003; Travers, 1997) and the matching model (Levkoff, Prohaska, Weitzman, & Ory, 2000; Levkoff & Sanchez, 2003) provide conceptual frameworks and systematic strategies for developing cooperation, collaboration, and partnerships between researchers and communities.

These consumer-centered models (Areán, Alvidrez, Nery, Estes, & Linkins, 2003), designed to increase senior and minority recruitment, should also enhance caregiver recruitment. However, the framework of community involvement recruitment strategies may not be as applicable to caregivers, who are often, by virtue of the caregiving task, isolated from their usual community linkages. Another framework for understanding, designing, and organizing recruitment strategies for caregivers is social marketing. Social marketing principles provide a useful theoretical framework for organizing the recruitment activities inherent to clinical research and can help researchers identify the elements that can be adjusted to maximize the achievement of recruitment goals. To be successful, a social marketing framework will use the strategies of the consumer-centered models and could easily be used as an adjunct to develop the planning document for recruitment. The strength of social marketing is its placement of these strategies in a comprehensive plan that allows for planning of recruitment campaigns, identification of potential difficulties and costs, and appropriate allocation of resources.

The basis of social marketing is the application of commercial marketing techniques to the analysis and the planning, execution, and evaluation of programs to influence the behavior of target audiences to improve their welfare and that of society (Andreason, 1995). Although social marketing is more typically used in public health initiatives designed to change behavior (Siegal & Doner, 1998), the use of marketing principles can enhance subject recruitment, which is critical to the success of any research study (Nichols, Malone, Tarlow, & Loewenstein, 2000).

The components of a social marketing approach include the following steps:

1. Defining and identifying the target audience (potential participants): The identification of the target audience (potential participants) is intertwined with the identified need or problem (who has the problem?) and the development of the intervention to address the problem (what intervention will this group accept?).
2. Developing the product (research intervention): Interventions are designed to address a problem, which must be serious enough for potential participants to be interested in the intervention. Embarrassing or taboo problems may be more difficult to address

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because participants may not admit having the problem. The intervention must also be socially and culturally acceptable to the participants.

3. Managing the price: Participating in the intervention and making any behavior changes have a cost to the participant, costs that could include time and effort, as well as financial costs. Minimizing costs increases the likelihood of successful recruitment and retention and implementation of the intervention by the participants.
4. Improving accessibility (place): Improving accessibility to the place or places where recruitment occurs and where participants receive information about, or engage in, the intervention improves recruitment and retention. Accessibility can involve location, convenience or cultural acceptability.
5. Promoting the study: Marketing techniques must be designed to reach the target audience.
6. Working with partners: Community partners in formal and informal organizations can provide assistance in recruitment, including referrals, space, screening, and credibility.

In a research framework, the typical four Ps of marketing—product, price, place, and promotion—can be easily expanded to include identifying participants and working with partners. These six Ps are the basics of any marketing strategy, variables that marketers can alter to successfully sell a product (Nichols et al., 2000). Marketing an intervention is a critical research strategy even when communities or individuals have expressed a desire to participate and have iterated needs or wants they wish to achieve as an outcome of the study.

For interventions designed for dementia caregivers, social marketing provides a way to ensure that caregivers find an intervention attractive. To be maximally effective, interventions must be not only scientifically and theoretically sound, with components as identified in the caregiving literature, but also fit within the constraints of caring for a frail person with dementia. For example, multidimensional interventions tend to generate larger effects (Bourgeois, Schulz, & Burgio, 1996); however, these interventions may be too time consuming for caregivers unless carried out in the home. In addition, individuals or cultural groups who are either embarrassed or reluctant to label memory problems as dementia or ask for help may reject interventions publicized for dementia (Levkoff & Sanchez, 2003).

This article describes the social marketing model and its principles as a theoretical framework to better understand recruitment activities for dementia caregivers. Examples of strategies that are appropriate for each principle are from a multisite study of interventions directed to caregivers of persons with dementia.

Resources for Enhancing Alzheimer's Caregiver Health (REACH)

The Resources for Enhancing Alzheimer's Caregiver Health (REACH) study was a multisite, randomized, controlled experimental study, funded by the National Institute on Aging (NIA) and the National Institute of Nursing Research (NINR), to evaluate the feasibility of different social, behavioral, technological, and environmental caregiving interventions targeted to the health and well-being of caregivers of persons with Alzheimer's disease. Six clinical sites were located in Birmingham (University of Alabama, Birmingham, Tuscaloosa), Boston (Hebrew Rehabilitation Center for Aged-Research and Training Institute), Memphis (University of Tennessee, Memphis VA Medical Center), Miami (University of Miami, Florida), Palo Alto (Stanford University, California, Veterans Affairs Palo Alto Health Care System), and

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Philadelphia (Thomas Jefferson University), with a coordinating center in Pittsburgh, Pennsylvania (University of Pittsburgh).

REACH was successful in both overall subject recruitment (a majority of sites exceeded their target numbers) and in recruitment of the targeted ethnic and racial groups of African American/Black, Caucasian/White, and Hispanic/Latino, although original recruitment goals were not met. Recruitment goals were based on power analyses for detecting significant intervention effects of the different intervention strategies at the six sites—hence the different numbers across sites. Table 1 depicts recruitment of caregivers by site and ethnicity and race. The original REACH cohort of 1222 caregiver/care recipient dyads constitutes the largest national database of diverse caregivers actively participating in intervention studies. Full descriptions of the REACH study have been previously published (Schulz et al., 2003).

Social Marketing Principles as a Framework for Research

REACH provides examples of appropriate strategies for the six social marketing principles. REACH used many of the best practices from consumer-centered models; however, overall recruitment activities were not organized into a particular framework or model.

Identifying Participants: Defining The Target Audience

The first and most important part of a recruitment strategy is to determine the target audience. Once the target audience is identified, program components can be developed that address audience needs, perceptions, and values (Nichols et al., 2000). The target audience for REACH included racial and ethnic minorities, who have been underrepresented in prior dementia research (Aranda & Knight, 1997; National Alliance on Caregiving and American Association of Retired Persons, 1997; Ory et al., 2002; Ory, Yee, Tennstedt, & Schulz, 2000; Shadlen & Larson, 1999). Each site’s recruitment efforts included different strategies that might motivate ethnic and racial minority participants to enroll in the study (Kelty, Hoffman, Ory, & Harden, 1999; Levkoff & Sanchez, 2003; Sutton, Balch, & Lefebvre, 1995).

Inclusion and exclusion criteria were the same across the six sites, although some sites had additional site-specific inclusion and exclusion criteria related to intervention design. To maximize intervention benefits, caregivers were chosen if they (a) were family members who lived with the care recipients, (b) provided a significant amount of care, and (c) had been providing care long enough to understand the challenges of caring for someone with dementia and problem behaviors. Care recipients were chosen who had functional deficits that would burden caregivers but who could still remain manageable at home during the 18 months of data collection.

Developing the Product

Defining the product

In marketing, a product is defined as the behavior, good, service, or program exchanged for a price (Siegal & Doner, 1998). In clinical research, the intervention is the product. Although the first consideration for any intervention is its scientific and theoretical basis, the intervention must also meet the needs, wants, interests, or desires of the potential research participants—the target audience. In particular, the product must address a problem that is perceived as serious and amenable to intervention. The basic REACH interventions, as defined by the NIA and NINR, were social, behavioral, and/or technological interventions to enhance family caregiving for persons with dementia. From this broad definition of intervention (product), and using a stress-health model (Cohen, Kessler, & Gordon, 1995) adapted to caregiving (Schulz, Gallagher-Thompson, Haley, & Czaja, 2000), each REACH site further defined a caregiving

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intervention to meet the needs of its target audience including ethnic and racial minority families at each site (Schulz et al., 2003).

The product's competition

A significant obstacle to recruiting potential research participants for participation in interventions is the amount of competition for their time and energy. Attention to the principles of social marketing is even more critical when there is competition. Community resources (e.g., case management services, ongoing support groups) may give potential participants the impression that their participation in unproved or nonpharmacological interventions is not necessary. Research resources may cause competition for research participants, who may not want or be allowed to participate in multiple studies. For example, in Boston, during REACH's recruitment period, there were 15 studies per month recruiting older adults and a total of 45 dementia studies.

Managing the Price

In social marketing, price is defined as the cost to the target audience member (in money, time, effort, lifestyle, or psyche) of engaging in the behavior (Siegal & Doner, 1998; Swanson & Ward, 1995). For dementia caregivers, costs for participation in an intervention can be high, particularly if respite service or someone to stay with the patient is not available. Caregivers must be able to reconcile the perceived costs of participation with the perceived benefits of participation or with an altruistic benefit, such as helping other caregivers in the future. In a research study, costs are also incurred in recruiting potential or actual persons for participation. These costs are in addition to those that may be required to implement the intervention. These study costs may affect the study's ability to minimize participant cost. For example, the cost of providing an intervention in the home may be prohibitive, thus increasing participant cost to travel to the intervention site.

Types of costs

Although there were no actual monetary charges for any of the REACH interventions, participants nevertheless experienced time and energy costs. One cost for research participants is data collection (Hudson, Leventhal, Contrada, Leventhal, & Brownlee, 2000). Some data collection costs were common to all sites, whereas others varied across sites and intervention settings. The 393-item REACH core data collection battery, a cost common to all sites, took an average of 60 minutes to 90 minutes for caregivers to complete every 6 months. Each site added measures to investigate site-specific research questions (see Table 2), and some sites added data collection points, thereby increasing costs to participants.

An associated research cost is intervention time. For REACH, intervention costs varied across sites, from 510 to 3390 minutes per year. At several sites, interventions and data collection occurred at the same visit, extending the amount of time required of caregivers (and perhaps care recipients) per visit, but decreasing the number of required trips. The frequency of intervention contact also varied. These time costs affect homemaker, retired, and employed caregivers differentially, as they compete not only with caregiving tasks, other familial obligations, and personal needs but also with wage-earning hours. Across the sites, 74 (6.1% of all) participants cited intervention or data collection length as reasons for discontinuing. Birmingham's 8.6% of caregivers who cited time as a factor in discontinuing the study may have been responding to an additional 3-month data collection point, as neither the data collection nor intervention time were the longest in the study, as shown in Table 2.

The time necessary for data collection and the time required to conduct interventions are not always the only costs to research participants (Boles, Getchell, Feldman, McBride, & Hart,

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2000; Ford, Havstad, & Tilley, 2003). Some REACH sites required additional work between interventions (e.g., behavior logs, homework). Travel was a major cost for participants, in time, money, and effort. Travel difficulties could include (a) additional time to prepare the care recipient for travel, (b) special transportation for the care recipient, (c) the cost and difficulty of hiring a professional attendant (or finding a friend or family member) for the care recipient, and (d) fatigue and additional behavioral problems involved with taking the care recipient outside the familiar environs of home. Both the Memphis and Palo Alto interventions were not in the home; however, only Memphis caregivers (2.9%), who typically had the care recipient with them, listed travel as a reason for discontinuing the study.

Minimizing costs

In marketing, an important pricing principle is the marketer's ability to reduce or minimize consumer cost. Most REACH sites provided comparison and control participants with minimum services—such as basic educational material on dementia and caregiving topics and active listening to caregiver concerns—to balance the cost of participating in data collection. In addition, most sites also offered to enroll their control and comparison participants in more intensive interventions after completion of data collection. All but two sites paid participants for data collection or intervention participation. It remains unclear whether a financial incentive for these two sites might have motivated individuals who refused to participate. Other ways to minimize costs included home interviews, follow-up interviews by telephone to minimize participants' travel costs, attendants (or funding for an attendant), transportation, and parking for intervention or data collection sessions.

Both Miami and Palo Alto minimized caregiver costs by providing recruitment, intervention, and data collection activities in the preferred language of the caregiver, either English or Spanish, a common technique for reducing participant burden (Gallagher-Thompson, Solano, Coon, & Areán, 2003; Hazuda et al., 2000; Levkoff & Sanchez, 2003). Sites decreased the psychic or emotional cost to the caregiver in two ways. At all sites, project staff shared similar cultural backgrounds with caregivers or were trained in cultural competency in the participants' culture (Areán et al., 2003; Kagawa-Singer, 1997; E. E. Thompson, Neighbors, Munday, & Jackson, 1996). This understanding of the cultural worldview and circumstances of the participants eased communication and decreased misunderstandings. In addition, most sites had the same researcher or interventionist see the caregiver each time. The rapport built over time may have been a significant factor in retaining participants in the study, as caregivers often listed the interventionists in their support network.

Improving Accessibility (Place)

In a research milieu, place can be conceptualized as the location where the participant will receive information about, or engage in, the intervention (Nichols et al., 2000). Intervention sites included participants' homes, physicians' offices, memory clinics, health care institutions, dementia-focused organizations (such as adult day care), and other community sites. In many cases, intervention sites were also recruitment sites. The more accessible the place was to the participant, for recruitment and for intervention, the more likely it was that participants enrolled, and remained, in the study.

Sites with workshops as part of their interventions conducted them in community sites that were not only convenient but also were neutral or appropriate sites for the cultural group recruited. For example, Palo Alto held workshops in the participants' neighborhoods or areas of town where each of the two cultural groups felt comfortable. The experiences of REACH and other groups (Areán et al., 2003; Gallagher-Thompson et al., 2003) have shown that different religions or congregations may not be comfortable in church buildings that are not their own, and libraries and senior centers may be perceived as more acceptable. The majority

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of sites conducted their interventions in the home, further decreasing caregiver cost and increasing accessibility.

Promoting the Study

Promotions are defined as a combination of advertising, media relations, promotional events, personal selling, and entertainment to communicate information about the product to target audience members (Siegal & Doner, 1998). An important component of promotion is to identify acceptable avenues that reach the target population. Given the emphasis on recruiting minorities into this study, REACH investigators at each site tailored recruitment strategies and media expenditures to fully account for the needs and preferences of ethnic and racial populations. For example, each REACH site used professionally designed brochures, with language and translations appropriate for the sociocultural context of local groups (e.g., *memory loss* instead of *dementia*; Gallagher-Thompson et al., 2003). Strategies used by sites included newspaper articles and advertisements, flyers, articles and advertisements in newsletters, Web sites, television and radio, targeted and mass mailings, brochures, magnets and other promotional items, community presentations, and community service.

Newspaper advertisements are often not successful in generating referrals (Areán et al., 2003), and this held true for REACH. The failure of newspaper advertisements to produce research referrals may be attributed, in part, to advertisements not targeting the individuals who need the service, eligibility of fewer persons, and callers knowing little about their fit with the project, as the amount of information in the advertisement is small. Newspaper advertising also is relatively expensive. For example, the Memphis site had no referrals from its $1,500 advertisement, nor did Boston for its two advertisements. Nevertheless, newspaper advertisements proved useful in attracting some targeted REACH groups. In Birmingham, advertisements were a viable recruitment tool for persons in the African American/Black community disconnected from formal health care or social service networks. Philadelphia achieved good results with advertisements placed in neighborhood newspapers and in series, for 4 to 6 consecutive weeks. In contrast, advertisements and articles in newspapers targeting the Hispanic/Latino community were not successful in recruiting these caregivers for Palo Alto.

As demonstrated with newspaper advertising, wide, nonfocused advertising in workplace newsletters was not successful, either. However, there was little or no cost for dissemination of this information. Alternatively, senior-focused newsletters from local hospitals and newsletters from Alzheimer’s organizations were quite successful in generating participants at several sites. These senior newsletters placed ads and articles or included materials to be mailed to newsletter recipients. Targeted mailings, especially those with a personalized letter, were successful, whereas untargeted ones to a broad sample were not. For example, Boston had no referrals from its 8,000-person voter registration mailing. Mailing lists targeting likely caregivers included those from local Alzheimer’s and aging agencies, churches, university clinics, and home care groups. Philadelphia’s very successful mailings were directed to caregivers on waiting lists for services from the Philadelphia Corporation for Aging.

Boston employed the high-tech medium of its Web site, which also allowed for online screening of potential subjects. Local and national (CNN and Headline News) media attention for the REACH sites included television and radio feature stories, public service announcements, and appearances on talk shows. There were differences in responses to these media. In Miami, Hispanic/Latino caregivers responded well to television and radio health and talk shows, with a total of 48.1% Spanish-speaking caregivers recruited from this medium versus 33.3% English-speaking caregivers. In contrast, Palo Alto Hispanic/Latino caregivers responded well to television but not to radio, with no referrals coming from radio presentations.

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Community outreach also served as a vehicle for promoting the REACH study. Community forums, talks and lectures at professional and ministerial associations, meetings of local health and social service organizations, churches, adult day-care centers, support groups, civic organizations, and neighborhood associations served as avenues for informing other professionals and dementia caregivers about research opportunities at several sites.

Combining community service and recruitment proved to be a time-consuming but successful tactic, as REACH staff offered technical assistance to an Alzheimer's association on survey design, chaired committees for local Alzheimer's organizations (Mahoney, 1994; Tarlow & Mahoney, 2000), and offered workshops.

Working with Partners

Although classic marketing theory does not include partners as one of its four P's, the synergy of partners with place and promotion provides a powerful marketing strategy, particularly in the context of research. Partners are defined as other organizations involved with a social change effort or serving as conduits to target audiences. Partners played a major role in recruiting REACH participants. Recruiting efforts were particularly successful when the partners were located in a convenient or credible location, such as a physician's office, or when promotion efforts were directly tied to the partner's roles, such as providing information on REACH in an Alzheimer's day care newsletter. For Miami, 56.5% of English-speaking and 47.2% of Spanish-speaking caregivers came from partner referrals, particularly memory clinics. However, effective partnering requires early identification and continued attention from the research staff.

Partner education

Effective relationships with partners from both formal and informal networks are essential in marketing a research study (Areán et al., 2003). Several sites provided training sessions at local Alzheimer's affinity group meetings, aging affinity groups, and local hospital systems. These groups provided services to individuals with Alzheimer's or their caregivers and were a good source of referrals for REACH as well as a bridge for providing caregiver assistance within the community after REACH ended. Continued personal contact during the course of the study permitted research staff to learn the cultures—norms, attitudes, behaviors, and values—of the referring agencies and how best to work within those cultures in building relationships.

Partner referrals and recruitment

Recruitment efforts were particularly successful when place was linked to one of the REACH partners. Philadelphia worked with their local Area Agency on Aging for recruitment. Recruiting through home health agencies allowed Birmingham researchers access to more African American/Black care recipients and families who do not usually seek specialized dementia evaluations or treatments for their relatives. Participants responded well to letters about the REACH project sent by their physicians as the REACH project served as an extension of the physician's or clinic's services. The Memphis staff modified the successful pharmaceutical detailing strategy and provided recruiting reminders and educational materials for the offices.

Some of the REACH sites provided incentives to their partners for referrals, including monetary rewards and movie tickets. However, to ensure that referrals are in the best interest of potential participants and not influenced by monetary gain for referring individuals, many universities prohibit the giving of money or gifts to referral sites.

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Barriers to partnering

Changes within partnering agencies can prove disastrous to recruitment efforts. At Birmingham, changes in reimbursement for home health care reduced the number of persons eligible to receive services and resulted in personnel cuts at these agencies. Consequently, REACH staff experienced a decrease in referrals. Offers of monetary incentives for home health referrals were ineffective in increasing referrals.

For Boston, a hospital merger triggered downsizing and the closing of several clinics that were referral sources (Corrigan, Mechanic, Solomon, & Williams, 1997). A second referral site, after converting to for-profit status, opposed partnering the study, citing fear of negative publicity from withholding services from control group participants. In Palo Alto, two state propositions, broadly viewed as anti-immigrant and anti-affirmative action, were enacted before and during REACH. These laws erected barriers of mistrust between Hispanic/Latino community partners (and their clientele) and the university-based and federal government–based REACH project. This type of mistrust is common (Levkoff & Sanchez, 2003).

Discussion

Although Alzheimer’s caregivers are often difficult to recruit into studies because of issues of transportation, fatigue, hopelessness, and frailty of and attention needed by the care recipient, every study encounters obstacles that influence recruitment or retention (Dowling & Wiener, 1997; Graham et al., 1991; M. Thompson, Heller, & Rody, 1994). The number of participants who meet entry criteria and agree to enter a study will be fewer, often by several fold, than original projections (Hulley & Cummings, 1988).

The successful REACH strategies used to meet recruitment goals were similar to those identified in other studies. Successful strategies to minimize price to the participants included reimbursement for data collection or intervention, payment for respite during the intervention, and providing the intervention in the home. For promotion strategies, in general, targeting potential participants directly was most effective (Areán et al., 2003), through such mechanisms as letters to caregivers who had expressed a need for assistance or working with partners (e.g., Alzheimer’s groups, aging agencies, home health agencies, physicians, memory clinics) who were aware of caregivers’ needs. Broad-based strategies were effective when they targeted the population from which caregivers might be drawn (e.g., Spanish-language television shows, neighborhood newspapers). The most successful strategies involved working with community partners, specifically, organizations that worked with Alzheimer’s caregivers, who provided a linkage to potential participants both in terms of referrals and rapport. Recruitment was particularly effective when partners were located in a convenient place or a place that was targeted to Alzheimer’s caregivers, such as a memory clinic.

As is clear from the success of work with community partners, when there was congruence between the aspirations of researchers and the goals of the caregivers, as well as the needs, wants, and preferences of the target audience and the project, recruitment was more successful. Research on treatment adherence has shown this same finding—that congruence among patients’ needs, wants, preferences, and the treatment influences the likelihood of adherence to a treatment regimen (DiMatteo et al., 1993; Donovan & Blake, 1992; Dye & DiMatteo, 1995; Lipkin, 1994; Meichenbaum & Turk, 1987).

Strategies to enhance recruitment are often undertaken without a comprehensive plan. A social marketing plan provides a framework to map out the steps in recruitment that will be needed and to plan for allocations of time, staff, and resources. (For a comprehensive guide to social marketing planning, see Weinrich, 1999.) For example, a social marketing plan would help

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identify potential partners, who play a key role in recruitment particularly in minority communities, early in the conduct of the study.

In addition, using the principles of social marketing as an organizing framework provides a means for researchers to clarify the relationships between the proposed research project and the participants in a systematic fashion. This critical appraisal is particularly beneficial for recruitment and for recruitment of racial and ethnic minorities. Researchers often use the same recruitment strategies for each population, based on the assumption that what has been successful with one population in one study will succeed with another population in another study. However, taking into account the six P's of participants, product, price, place, promotion, and partners enables the researcher to develop, implement, and evaluate recruitment strategies systematically rather than randomly or haphazardly. Researchers can determine the least costly or most effective marketing strategy that has reached the targeted audience in the past and begin recruitment with this type of promotion. This targeted approach prevents wasted time, energy, and funds deployed for strategies that are not appropriate for the designated audience. For example, participating in media events, such as talk shows, that are not appropriately targeted may seem to be a small cost of time and energy for the researcher, but each unsuccessful effort takes a psychic toll in disappointment and anxiety that recruitment goals will not be met. However, using media or advertising that are popular with the target audience improves recruitment success.

A second result of clarifying project and participant relationships systematically is the realistic assessment of costs/risks and benefits. This is particularly important in light of recent increased emphasis on human participants protections and informed consent. Despite the often negative and manipulative image of commercial marketing, a social marketing perspective can increase the protection of research participants. Understanding the needs, wants, and preferences of the target audience should help the researcher assess what benefits from the intervention will be meaningful to participants. Categorizing the intervention in terms of price and place provides a means to determine what the actual costs to the potential participants will be, in terms of time, resources, and effort, and how these costs could be minimized or removed. Strategies to minimize or remove costs could also be construed as benefits (e.g., monetary incentives for data collection, attendant service for a dementia care recipient during data collection).

Social marketing, the application of commercial principles to change behavior, enables the researcher to use multiple sources to identify the needs, wants, and preferences of the target audience. Costs and benefits to the target audience can be systematically incorporated into study design and recruitment activities. This planning approach can help to identify potential difficulties and resource allocations. Further work with the social marketing framework is needed to determine if it can assist researchers in evaluating their recruitment plan, especially its costs and effectiveness.

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Table 1

Recruitment by Site and Ethnicity

	Birmingham	**Boston**	**Memphis**	**Miami**	**Palo Alto**	**Philadelphia**	**All Sites**
Recruitment goal	140	160	240	216	330	250	1,336
Randomized (percentage)	140 (100)	100 (63)	245 (102)	225 (104)	257 (78)	255 (102)	1,222 (91)
% White/Caucasian	57.1	79.0	58.6	49.8	57.2	48.2	56.0
% African American/Black	42.9	16.0	39.8	—	—	47.8	24.2
% Hispanic/Latino (Mexican)	—	—	—	—	30.0	—	6.3
% Hispanic/Latino (Cuban)	—	—	0.4	50.2	0.8	—	9.5
% Hispanic/Latino (Other)	—	2.0	0.4	—	12.1	—	3.2
% Other	—	3.0	0.8	—	—	2.0	0.8

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Table 2

Price and Cost Factors

Site	Intervention Time in Minutes per Year	% Caregivers Citing too Time Consuming as Reason for Discontinuation	Intervention Site	% Caregivers Citing Travel as Reason for Discontinuation
Birmingham	990	12	Home	0
Boston	510	8.6	Home	0
Memphis	510	5.7	Physician office	2.9
Miami	3,390	3.6	Home	0
Palo Alto	2,160	7	Community	0
Philadelphia	800	10	Home	0