

Implementation of a Patient Medication Assistance Program in a Community Pharmacy Setting

Verne L. Mounts, Daniel G. Ringenberg, Kim Rhees, and Christina Partridge

ABSTRACT

Objective: To describe the establishment of a community pharmacy–based patient medication assistance program to improve access to medications by indigent patients, lessen the burden placed on physicians in obtaining such medications, reduce the amount of money spent on such medications by area charitable organizations, and improve therapeutic outcomes by improving patient adherence with therapy.

Setting: Supermarket-based pharmacy in Ashland, Ohio.

Practice Description: Community pharmacy.

Practice Innovation: A partnership was developed among Buehler's Pharmacy #3, United Way of Ashland County, and United Way Affiliates to establish a community pharmacy–based medication assistance program to help indigent patients obtain needed medications through manufacturer assistance programs and discount card programs.

Interventions: Following initial screening by a United Way affiliate agency, patients are seen by appointment by a Certified Pharmacy Technician at the pharmacy. An electronic application is completed, printed, and sent to the patient's physician for signatures and medication orders. The paperwork is returned to the pharmacy, where it is completed, signed by the patient, and filed. The patient pays the United Way agency \$10 and the pharmacy \$15 for these services.

Main Outcome Measures: Number of prescriptions dispensed cumulatively from April 1, 2003, to July 31, 2003, within the program, patients' cumulative savings, and community response.

Results: Between April 1, 2003, and July 31, 2003, a total of 123 patients and 47 physicians were served, and 512 medications valued at \$112,139.00 were applied for and/or procured. The time lapse between filing of paperwork and receipt of medications varies from 1 to 6 weeks. While some manufacturers ship product to physicians or directly to patients, the process works better when the product is sent to the pharmacy, where it can be added to the patient's profile, screened for drug interactions and allergies, and dispensed with proper labels and counseling.

Conclusion: Establishing a community pharmacy–based medication assistance program is an innovative spin on the traditional physician office, advocacy, or health-system setting and was found to be beneficial to the patients, physicians and other health care providers, and the community it served.

Keywords: Patient assistance, medication assistance, prescription assistance, indigent, community pharmacy, adherence.

J Am Pharm Assoc. 2005;45:76–81.

Received September 5, 2003, and in revised form January 15, 2004. Accepted for publication February 26, 2004.

Verne L. Mounts is Director of Pharmacy Services, Buehler's Food Markets, Ashland, Ohio. Daniel G. Ringenberg, was a final-year doctor of pharmacy student, College of Pharmacy, Ohio Northern University, Ada, at time the manuscript was written and submitted for publication; he is currently Pharmacist, Firelands Regional Medical Center, Sandusky, Ohio. Kim Rhees, CPhT, is Pharmacy Technician, Buehler's Pharmacy #3, Ashland, Ohio. Christina Partridge was Clinical Pastor Counseling MA Graduate Student, Ashland Theological Seminary; and Patient Advocate, Buehler's Pharmacy #3, Ashland, Ohio, at the time this study was conducted.

Correspondence: Verne L. Mounts, Patient Medication Assistance Program of Ashland County, 1055 Sugarbush Dr., Ashland, OH 44805. Fax: 419-282-9431. E-mail: vmounts@buehlers.com

Disclosure: The Patient Medication Assistance Program (PMAP) of Ashland County is strictly a not-for-profit venture with no institution experiencing monetary profit as all moneys received are placed directly back into PMAP. The program is conducted in a step-wise fashion from various physical locations including the above-mentioned United Way of Ashland County and its affiliates as well as Buehler's Pharmacy #3. Buehler Food Markets, Inc. holds no financial interest in the program, with the exception of imposed publicity and good name. Mr. Mounts, Ms. Rhees, and Ms. Partridge are all currently employed with Buehler Food Markets, Inc. None of the authors has direct association with the United Way or its affiliates. The authors declare no other conflicts of interest or financial interests in any products or services mentioned in this article, including grants, employment, gifts, stock holdings, or honoraria.

Funding: Made possible by grants from by the United Way of Ashland County, which included moneys from Firelands Electric People Funds, Inc., and Ashland County Community Foundation.

Acknowledgments: To Kay Conrad and Becky Plank for helping originate the idea of the PMAP of Ashland County, for helping achieve appropriate funds for its inception, and for continued support and dedication in making the program a success. To Joseph T. DiPiro, PharmD, FCCP, Karen L. Kier, PhD, MSc, and Marc A. Sweeney, PharmD, for review of the article and suggestions on structure and content.

Previously presented to the *Ashland Times-Gazette* and the United Way of Ashland County and its affiliates, Ashland, Ohio, August 28, 2003.

Patient assistance programs (PAPs) are a valuable yet underused resource in the procurement of medications for uninsured or indigent patients. These programs, sponsored by pharmaceutical manufacturers, can potentially increase the percentage of patients receiving proper long-term pharmaceutical care. This, in turn, has positive implications for the patient and the society in which he or she lives. Benefits are seen directly and indirectly through increased adherence, decreased adverse health complications and associated costs, and increased productivity in society. These programs, however, are often overlooked by, or possibly even unknown to, those in position to use them. Also, the pharmaceutical companies themselves have stringent criteria and complicated processes. This often requires the knowledge of an experienced person in applying for and receiving the medications.

Currently, PAPs are being used in a number of different settings, including physician offices, clinics, the Internet, advocacy groups, government agencies, and health-system pharmacies. Each has benefited the patients involved, and cost savings realized by the latter two have been substantial and well documented.¹⁻⁵

However, these settings often have limitations that prevent the use of these programs to their maximum potential. The first and

perhaps most important limitation is the absence of the pharmacist in the dispensing process in all settings with the exception of the health-system pharmacy. Pharmacist intervention plays a vital role in the patient's overall care and can ultimately decrease health care costs,⁶⁻⁸ prevent therapeutic duplications,⁹ and improve patient outcomes via counseling/education,^{10,11} monitoring,^{12,13} and by obtaining a more comprehensive patient history.¹⁴ Likewise, other limitations hinder the usefulness of these programs in such settings. Many individuals and physicians have become disillusioned by the vast amount of required paperwork and subsequent burden, and thus refuse to deal with such programs. The Internet may not be a feasible option for a patient population that is already struggling financially. Government resources are not as common as one may hope, as only 15 states have thus far passed legislation or created offices to coordinate these pharmaceutical PAPs.¹ Furthermore, accessibility may be an issue for each of the above-mentioned settings.

Practice Innovation

The idea that ultimately became Patient Medication Assistance Program (PMAP) of Ashland County was birthed back in November 2001. The proposal was to initiate an assistance program that would be less expensive, more efficient, more comprehensive, and a safer alternative than those offered to the community at that time. The hope was to lessen the growing burdens of local physicians who were becoming increasingly disenchanted with such programs because of their experiences in their own offices. However, with an average per capita income of \$21,806 (versus \$28,699 statewide; 2001 data), a poverty rate of 9.5% (as of 1999), and 28.7% of its population with incomes of less than \$25,000 (1999),^{15,16} the primary intent was to help people in the economically struggling Ashland County obtain needed health care.

Approval was obtained from fellow colleagues and officials from local charitable agencies. Grant money was acquired through a collaborative effort. The key player was United Way of Ashland County. Two grants were obtained, one from Firelands Electric People Funds, Inc., and the other from Ashland County Community Foundation. This seed money was used to cover costs associated with program launch, which included salary reimbursement for the Certified Pharmacy Technician, subscription fee for the Indicare application processing program, and raw materials. A pharmacist's supervisory time and involvement were provided gratis. Following publicity in the local media, the program officially started on April 1, 2003.

The program is a joint endeavor of patients, United Way of Ashland County, United Way affiliates (Ashland County Council on Aging, Ashland County Cancer Association, Ashland Parenting Plus, Associated Charities), Buehler's Pharmacy #3, and physicians. The main setting for the program is a community-based pharmacy.

AT A GLANCE

Synopsis: The Patient Medication Assistance Program of Ashland County, Ohio, established by a partnership between a community pharmacy and charitable organizations, is described in this article. During a 4-month start-up period, 123 patients were assisted in applying for or receiving more than 500 medications, 47 physicians were served, and local charitable funds were spared. Per-patient savings totaled about \$912 before processing fees.

Analysis: Patient assistance programs sponsored by pharmaceutical manufacturers are underused. Access to these programs is hindered by paperwork requirements that challenge many patients, stringent criteria and application processes, and increasingly limited resources to provide application assistance. The absence of pharmacist interventions in these programs also presents a major drawback since pharmacists are not able to provide pharmaceutical care and thereby improve patient outcomes and ultimately reduce overall health care costs. The Patient Medication Assistance Program of Ashland County, located in a rural community pharmacy, provides convenience and privacy for patients, continuity and optimization of care, and improved access to medications for those in need; eases administrative burdens on physicians; and reduces expenditures of charitable organizations. The program provides invaluable benefits to the patients and the community it serves.

Practice Description

Participation in PMAP is initiated by one of the participating United Way affiliate agencies. The agency performs an initial screening to determine eligibility and completes preliminary paperwork. During this one-time initial screening process, financial documentation and patient-specific demographic information are gathered. An annual fee of \$10.00 per patient applies.

The patient then sets up an appointment with the participating pharmacy to meet in a face-to-face interview with our Certified Pharmacy Technician to begin the application process. During the interview, the pharmacy technician ensures that correct financial and medical information were obtained. Medical information includes patient-specific medications, dosages, quantities, allergies, and medical conditions. Health Insurance Portability and Accountability Act of 1996 policies are reviewed with the patient and the necessary paperwork is signed. Finally, applications for pharmaceutical manufacturer-sponsored discount cards (such as Together Rx Card, Lilly Answers Card, Pfizer Share Card) are also completed. This ensures comprehensive coverage in case of a future acute situation where a medication, such as an antibiotic, is needed, or in case a certain medication is not covered by a pharmaceutical PAP.

The technician, under direct supervision of the pharmacist, carries out the actual application process. The electronic program used to complete the application process is Indicare (www.indicare.com). Indicare is an automated online indigent PAP. An annual subscription fee is paid for this service. It should be noted that Indicare is only one of the few available options for such programs. With this program, the technician has access to a comprehensive list of medications covered by indigent programs. After adding the patient to the pharmacy-specific database, the technician searches for medications covered by the programs for the patient. If the medication is available, a manufacturer-specific application is filled out (much of which is automated) with the correct patient and physician information. A copy of the claim is automatically saved in the patient's records for future reference and use in obtaining refills.

The completed application is printed using a desktop printer. Manufacturer-specific detailed directions for the steps involved in obtaining that particular medication is printed as well. The completed paperwork is organized and readied to be sent to the physician's office for proper signatures and prescription orders. A letter to the physician is easily typed using a template, which explains the process, details necessary or desired action, and includes recommendations from the pharmacist about possible therapeutic alternatives. Along with the completed medication applications and letter to the physician, a letter of request for deviation is included for each medication. The request for deviation is of paramount importance, as it allows drug manufacturers to send the medications directly to the pharmacy, versus the physician or the patient, for dispensing. Copies are made of all documents to be sent to physicians. Paperwork that needs only the physician's

signature is organized and mailed to the appropriate medical office along with a stamped return envelope addressed to the PMAP of Ashland Co. Thus minimal effort and time is required of physicians and their staff members.

After the paperwork arrives at the physician's office, a prescription for each indicated medication is transcribed for a 90-day supply. The physician also reviews and signs all necessary paperwork. The paperwork includes the medication applications, requests for deviation, and prescription orders. The completed paperwork is then placed in the self-addressed stamped envelope and mailed back to PMAP of Ashland Co. for completion.

Upon return of paperwork and prescriptions from physician's offices, the process is completed at the pharmacy. The patient is contacted and an appointment is scheduled for the patient to come into the pharmacy. When the patient arrives, proper signatures to complete the applications are obtained. At that time a \$15.00 application processing fee per prescription is asked of the patient. A maximum collectable amount per patient, \$60.00 every 90 days, has been established for patients with more than four prescriptions. The purpose of the fee is to replenish program funds and sustain the program by covering the cost of the technician's time and raw materials involved in the application process (Table 1). Although this fee is a requirement, it has been waived in extreme circumstances. The completed paperwork is then organized and mailed to the manufacturer for consideration.

Following a time lapse, anywhere from 1 to 6 weeks, the medication arrives either at the patient's home, the physician's offices, or preferably the pharmacy. Delivery to the pharmacy, and thus the need for the aforementioned request for deviation by the physician, is of utmost importance in ensuring proper dispensing and pharmaceutical care. Medications delivered directly from the manufacturer to the patient or relayed through the physician's office to the patient usually have no label or patient-specific directions for use. Dispensing medications without proper labeling is illegal in Ohio (OAC 4729-5-17).¹⁷ Dispensing the medication from the pharmacy ensures proper comprehensive patient medication profiling.

Table 1. Costs Associated with Application Processing in the Patient Medication Assistance Program of Ashland County, Ohio

Variable Costs	Fixed Costs
Technician time and salary	Indicare software
Telephone use	subscription fee
Postage	Computer and printer
Stationery	Space
Paper and ink for printer/copier	Postage meter
	Copier
	Telephone and fax machine
	Overhead
	Internet access

This, in turn, allows for screening for allergies, drug interactions, therapeutic duplications, and contraindications. This final screening process, performed in addition to a previous screening, ensures that the most comprehensive and up-to-date information is evaluated as the drug product is dispensed. It also allows for the pharmacist to ensure correct labeling and provide counseling on proper storage, directions on use, and potential adverse effects and how to manage them.

In summary, pharmacy delivery maximizes the therapeutic usefulness of the medication to the patient and minimizes potential dangers associated with prescription medications. The following is a case in point:

A woman who was terminally ill with cancer was taking fluoxetine (Prozac—Lilly) 20 mg in alternating daily doses of 20 mg and 40 mg. The 20 mg capsule of fluoxetine is not available via Eli Lilly—Lilly Cares assistance program. However, the 40 mg capsule is. The pharmacist asked the physician if for an alternative dosage that would be covered under the Lilly program. The physician decided to place the patient on fluoxetine 40 mg every day. The patient was informed of this change. Following the completion of the application process, the medication arrived at the physician's office. The office staff subsequently provided it to the patient. However, because of the patient's age and state of health, she forgot about the dosage change and continued to take one capsule one day followed by two capsules the next. Thus, she increased her dose by twofold. Weight loss ensued, reducing the patient's already frail body frame.

This mishap could have been prevented had the patient received proper labeling and counseling before dispensing of the product. The pharmacy can also lessens the burden placed on the physician or health care provider by taking responsibility for the dispensing process.

In regard to refills, much of the responsibility is placed upon the patient. The patient is instructed to contact the pharmacy approximately halfway into the patient's 90-day medication supply to ensure the availability of the next 90-day supply in a timely manner.

Results

Between April 1, 2003, and July 31, 2003, PMAP of Ashland County served a total of 123 patients. A total of 513 medications (mean, 4.2 medications per patient) were applied for and/or received, for a total savings of \$112,139 for patients (see Figure 1). Thus, mean savings were \$912.00 per patient for this 4-month period, or \$2,736 per year. These savings were computed before patient application processing fees (a maximum of \$240 per year plus the \$10 annual fee). The patients come to the program pre-screened by United Way affiliates, and as a result, the success rate

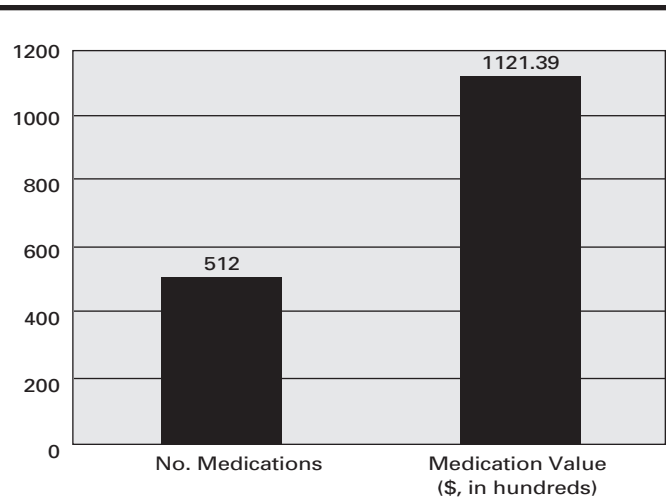


Figure 1. Medication and Monetary Benefits of Patient Medication Assistance Program of Ashland County, Ohio, Between April 1, 2003, and July 31, 2003

at the pharmacy level was approximately 98%. Many, if not most, patients were also qualified to receive discount cards from the pharmaceutical manufacturers at the time this study was conducted; many of these were phased out as discount prescription drug cards became available to Medicare recipients under the Medicare Modernization Act passed in late 2003.

A total of 47 physicians were served during the time covered by this report. Area charity funds were spared and used for other matters. Therefore, this program demonstrated cost savings to the patient, the community, and the physician/health care provider. As this is only the beginning of the program and the number of patients enrolled and medications accessed will inevitably grow, cost savings to the community of upwards of \$500,000 per year may be a realistic estimate in the near future. During the research for this article, similar PAPs that were looked at were all cost-beneficial to the patients, the health systems, the communities, and the health care providers that were involved.

Approximately \$3,000 has been realized in application processing fees thus far and have subsequently been returned to the PMAP of Ashland County grant fund. As previously mentioned, application processing fees are necessary for the continuance of the PMAP of Ashland County and replenishment of funds, as the original grant seed money was finite and would gradually run out. This money has covered all of the different costs associated with the program thus far. No pharmacist time is billed for, because it is complimentary provided. Also, no dispensing fees are requested from the pharmacy. The program is completely nonprofit, and if the program ever were to accrue an excess in funds, while meeting all expenses, the \$15.00 fee would then be reduced.

Discussion

PMAP of Ashland County

PMAP of Ashland County is similar to the previously available programs in a number of ways. The most important difference, however, is that of location. PMAP of Ashland County is operated out of Buehler's Pharmacy #3, a community pharmacy located in the rural community of Ashland, Ohio. Its location is convenient for the patient. No other pharmacy is more accessible than that of the community pharmacy. Pharmacists are the most accessible health professionals and likewise, the community-based pharmacy is the most accessible health care agency.

Administering the program from the community pharmacy also provides for continuity of care. Most medications obtained through manufacturer-sponsored PAPs are those necessary for chronic diseases such as hypertension, depression, and diabetes. To prevent discontinuity in patient care and to optimize pharmacotherapy, medications need to be accessible continually with no significant interruptions.

Another benefit in the community pharmacy setting includes comprehensive record keeping, which decreases the likelihood of therapeutic duplication. Patient monitoring, patient education, counseling, and therapeutic optimization via pharmacist-physician communication can also be carried out. Also, this type of setting is ideal for maintaining confidentiality, which has become an issue in our health care system. Patients walk out of the pharmacy with medications, drawing no additional attention to themselves because of the location.

Physician Benefits

The program results in numerous benefits to the community, some of which are directly associated with the physician's office. With this program, physicians and discharge planners have a local referral source to assist in managing the patient's medication needs once identified. The physician's office no longer has to evaluate the patient's financial information to determine eligibility. When the medications are sent to the pharmacy, the burden of storing the multiple 3-month supplies of medication is removed from physician office staff. Patients' questions regarding where and when to expect their medications no longer interrupt staff in physicians' office.

The physician also has the peace of mind knowing that the patient's medication is properly labeled and that counseling has been provided by the pharmacy. Also, to better meet the patient's needs, the pharmacist may suggest a therapeutic interchange to the physician to enhance greater use of pharmaceutical manufacturer programs, again saving the physician time and resources. PMAP of Ashland County minimizes paperwork for these offices, thereby eliminating barriers and reducing stress.

Financially, physicians and their staff members also benefit. Assuming a mean salary per hour of \$22 for a licensed practical or

registered nurse and that the time spent on the program has been 24 hours per week, the averted costs for affected physicians' offices would total \$27,000 per year.

Patient Benefits

Perhaps of greater importance are the benefits this program for the patient. Enabling a patient to gain access to necessary medications allows for much greater adherence to prescribed therapy, resulting in improved health, better quality of life, and decreased financial, emotional, and psychological stress.

Nonadherence with prescribed therapy is a problem that has many consequences for patients and society in general. Medication nonadherence has been linked to more than 100,000 deaths, hundreds of thousands of hospitalizations, and many nursing home admissions every year, with an estimated combined direct and indirect cost to the United States of \$100 billion annually, when associated costs are included (e.g., additional care, lost workdays, adjustment of drug therapy, laboratory tests, additional medications physician office visits).¹⁸

In a 2-year analysis, more than 2 million Medicare patients did not properly comply with pharmacotherapy because of costs.¹⁹ Not only does PMAP of Ashland County increase the probability of adherence via increased access to the patient medication, but adherence is improved when patients obtain their medications from pharmacists who provide counseling and education.¹⁸ Another obvious benefit to the program is that of direct financial savings to the patient.

Community Response

The program has been very favorably received by the community. Many patients have come to the point of tears upon realizing they could finally afford their medications. One patient wrote, "It's such a huge help to my husband and me, you'll never realize just how much! I'm still amazed that this type of help is actually available."

Physician office staff have commented on the decreased stress felt among office workers, nurses, and physicians. One area nurse expressed appreciation for the collaborative effort among United Way affiliates and Buehler's Pharmacy #3 and commented specifically about the decreased paperwork and frustrations in her office. An area medical assistant has received positive feedback from the office's elderly patients and hopes that other counties will adopt a similar program to help with patients residing outside Ashland County.

Public personnel have also noticed the positive impact of the program on the community. When asked to comment, a member of the licensing department of the Ohio State Board of Pharmacy said he was glad to see the resource available as a means of attaining needed medications. The director of social services at a local hospital commented that brochures describing the program are quickly leaving the display rack, and he has had fewer patients asking about patient assistance programs because they are already

aware of PMAP of Ashland County. The overall feedback has been positive with a few practical suggestions for small modifications to improve the program.

Conclusion

PMAP of Ashland County is an innovative approach to helping ease the burden associated with the procurement of necessary medications to patients in need. It is a truly philanthropic effort, with no excess revenues among any of the parties involved and motives of nothing more than improved health care for individuals in the community who are experiencing financial hardship. Although the direct financial benefits of our program to the pharmacist or pharmacy involved are minimal, this type of program has major implications for the community and the patients it serves. The resulting improved health care, patient satisfaction and respect that are attained through such a program should be incentive enough, because, after all, those are the goals on which the profession of pharmacy should focus.

References

- Hanson K. Drug assistance from drug makers. *State Legis.* 2003;29:22-4.
- Basskin LE, Richardson K. Survey of use of drug manufacturers' patient assistance programs by safety net providers. *Am J Health Syst Pharm.* 2002;59:1105-9.
- Coleman CI, Reddy P, Quercia RA, Gousse G. Cost-benefit analysis of a pharmacy-managed medication assistance program for hospitalized indigent patients. *Am J Health Syst Pharm.* 2003;60:378-82.
- Rosier RA, Phillips RE, Elam JW. Medication assistance outpatient program; providing access to free or low cost pharmaceuticals. Presented at: American Society of Health-System Pharmacists Midyear Clinical Meeting, December 2002, Atlanta, Ga.
- Weiner S, Dischler J, Horvitz C. Beyond pharmaceutical manufacturer assistance: broadening the scope of an indigent drug program. *Am J Health Syst Pharm.* 2001;58:146-50.
- Benrimoj SI, Langford JH, Berry G, et al. Economic impact of increased clinical intervention rates in community pharmacy. A randomised trial of the effect of education and a professional allowance. *Pharmacoeconomics.* 2000;18:459-68
- Rodgers S, Avery AJ, Meecham D, et al. Controlled trial of pharmacist intervention in general practice: the effect on prescribing costs. *Br J Gen Pract.* 1999;49:717-20.
- McMullin ST, Hennenfent JA, Ritchie DJ, et al. A prospective, randomized trial to assess the cost impact of pharmacist-initiated interventions. *Arch Intern Med.* 1999;159:2306-9.
- Krska J, Cromarty JA, Arris F, et al. Pharmacist-led medication review in patients over 65: a randomized, controlled trial in primary care. *Age Ageing.* 2001;30:205-11.
- Yuan Y, Hay JW, McCombs JS. Effects of ambulatory-care pharmacist consultation on mortality and hospitalization. *Am J Manag Care.* 2003;9:45-56.
- Morrison A, Wertheimer AI. Evaluation of studies investigating the effectiveness of pharmacists' clinical services. *Am J Health Syst Pharm.* 2001; 58:569-77.
- Garcao JA, Cabrita J. Evaluation of a pharmaceutical care program for hypertensive patients in rural Portugal. *J Am Pharm Assoc.* 2002;42:858-64.
- Tsuyuki RT, Johnson JA, Teo KK, et al. A randomized trial of the effect of community pharmacist intervention on cholesterol risk management: the Study of Cardiovascular Risk Intervention by Pharmacists (SCRIP). *Arch Intern Med.* 2002;162:1149-55.
- Nester TM, Hale LS. Effectiveness of a pharmacist-acquired medication history in promoting patient safety. *Am J Health Syst Pharm.* 2002;59:2221-5.
- Gliem R, Hornsby R. Ashland County. Ohio State University Extension. The Ohio State University. 2002. Accessed at www.osuedc.org/profiles/pdf/ashland_county_profile.pdf, August 4, 2003.
- Ashland County, Ohio. U.S. Census Bureau site. Accessed at <http://quickfacts.census.gov/qfd/states/39/39005.html>, August 4, 2003.
- Ohio Administrative Code 4729-5-17. Labeling by prescribers who personally furnish dangerous drugs to their patients (rule update effective March 31, 2000).
- Mistry SK, Sorrentino AP. Patient non-adherence: the \$100 billion problem. *Am Druggist.* 1999;216:56-62.
- Mojtabai R, Olfson M. Medication costs, adherence, and health outcomes among Medicare beneficiaries. *Health Affairs.* 2003;22:220-9.

Future APhA Annual Meetings

Orlando, Fla.	April 1-5, 2005	www.Go2orlando.com
San Francisco, Calif.	March 17-21, 2006	www.sfvisitor.org
Atlanta, Ga.	March 16-20, 2007	www.atlanta.net
San Diego, Calif.	March 14-18, 2008	www.sandiego.org
San Antonio, Tex.	April 3-7, 2009	www.sanantoniocvb.com
Washington, D.C.	March 12-16, 2010	www.washington.org