

The Importance of Self-Care in Pharmaceutical Education

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This special issue of the *International Journal of Pharmacy Education and Practice* emphasizes nonprescription products and the concept of self-care. Nonprescription products were neglected and/or underemphasized in pharmacy curricula for decades. However in the late 1990s, that situation began to change through the efforts of one visionary individual. Dr. Dennis Worthen of Procter & Gamble conceived of a forum for the advancement of self-care in pharmacy curricula, a concept that culminated in the first meeting of the Nonprescription Medicines Academy in August of 1998. His successor, Dr. Jenelle Sobotka, has labored diligently to ensure that this premiere annual meeting continues.

The rationale for including nonprescription products in the pharmaceutical curriculum includes several observations. First, it should be axiomatic that the purpose of a university education is to prepare students for positions they are likely to occupy. If a law student were to find that the curriculum included 20 hours of mechanical engineering, he or she would be justifiably upset. Similarly, the pharmacy education should prepare students for positions they are most likely to fill. According to the U.S. Department of Labor, approximately 62% of pharmacists work in community pharmacies.¹ Only 23% of salaried pharmacists work in hospitals, with the balance being employed in such venues as mail-order and Internet pharmacies, etc. The realities of the workplace, therefore, allow one to conclude that the student is almost three times more likely to use skills and knowledge specific to community pharmacy than those specific to hospital/clinical pharmacy. Despite this, many colleges of pharmacy require heavy memorization of treatment algorithms for such sophisticated conditions as cardiac arrhythmias and neoplasms. In the normal workday in community pharmacy, it is difficult to conceive of a phone call requesting that the pharmacist choose therapy for these or virtually any other condition normally managed by physicians. However, there is one situation in which most community pharmacists can choose therapy: self-care using nonprescription products and devices. In this case, patients ask for assistance without the presence of any other learned intermediary, leaving the pharmacist free to perform professional triage. Within this role, the pharmacist can perform a limited form of diagnosis through the recognition of minor medical conditions. Thus, for the typical community pharmacist, self-care is one of the most direct applications of pharmaceutical care. For this reason, instruction on self-care consultations should assume paramount importance in the education of pharmacy students.

Self-care with nonprescription products and devices is also a critical arena because of questions about the safety and efficacy of all nonprescription products and devices. Each nonprescription product or device is assumed to be completely safe for self-use by the FDA when all labeled directions are followed (with the exception of homeopathic products and "dietary supplements," such as herbals, none of which has been proven safe or effective for any use). These assumptions all rest upon the FDA's belief that patients will "read and heed" every word on the label of every product, including all precautions and warnings. Real data proves otherwise. NCPIE presented the results of a survey of 1009 adult Americans.² It was reported that 8% of consumers read nothing

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on the label of nonprescription products prior to purchase. Fifty-four percent fail to read the label to discover the active ingredient, 80% do not read the label to discover possible side-effects, and 77% fail to read the label for dosage information. Since many patients demonstrably do not read the label prior to use, the patient has only one avenue of protection from therapeutic misadventures in self-care: an informed pharmacist who is willing to consult with them. In order for the pharmacist to be informed, however, nonprescription product and device training must occupy a prominent place in the education of all pharmacists.

Another issue that underscores the importance of pharmacist training in nonprescription products is the Rx-to-OTC switch movement, which cannot be discussed without also considering a third class of medications. Forces within the U.S. have steadfastly refused to acknowledge the need for a third class of pharmacist-only medications, except in very narrowly defined situations, such as Plan B and pseudoephedrine. The result is an illogical situation when a medication is to be switched from prescription to nonprescription status. Before the day of the switch, a particular medication is judged safe for patient use only after the patient has completed complicated set of steps beginning with a visit to a physician, followed by a visit to the pharmacy for the original prescription and all refills. The prescription medication requires physician diagnosis and monitoring, and the presence of that learned intermediary to balance risks to the patient against potential benefit. Pharmacists are forced by law to counsel patients on the products when prescriptions are dispensed. However, at 12:01am on the day of the switch, the same molecule, often in the original prescription strength, magically becomes safe enough to be sold in any gas station, beauty shop, hotel lobby, airport shop, "quick stop," or vending machine. The FDA assumes that, at the stroke of midnight patients have become sophisticated enough that they no longer need a learned intermediary, and these products are safe enough that they can be sold by anyone, even a merchant whose position has no educational requirements, not even a kindergarten graduation certificate. As stated above, the assumptions on which this system rests are inherently flawed. Patients are unwilling to read the label with the care needed to make an informed decision. Further, the information needed for safe self-use of the product may be buried in an insert inside the box that is inaccessible to the patient at the time of purchase, as in the case with minoxidil and nicotine products. The presence of a trained pharmacist must be seen as vital prior to purchase to assist the patient by means of pharmacist triage.

An additional compelling reason for nonprescription product training is to allow the pharmacist to appropriately educate the patient about nonprescription products and devices. Patients often turn to ads and coupons for advice on product selection. However, the manufacturer's ad is not an educational vehicle, but a device to increase sales. One will never see an ad that states, "These are situations in which our product may not be best—in these cases, purchase Product X from our competitor instead." The pharmacist must counter these biased ads with unbiased information to allow the patient to decide which product is preferable. With an appropriate course in nonprescription products and devices, the pharmacist can become the only medical professional with specific university-based training in this area.

The vital need for training in nonprescription products is further underscored by the actions of the National Association of Boards of Pharmacy (NABP) in creating the

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blueprint for NAPLEX. NAPLEX is the examination taken by all United States pharmacy graduates to ensure that they possess minimal competency prior to licensure. NABP considers nonprescription product and device training an essential element of pharmaceutical competency. According to the examination's competency statements, the test requires the candidate to perform the following tasks directly or indirectly related to self-care (among others):³

- Competency 1.1.0: Obtain, interpret and evaluate patient information to determine the presence of a disease or medical condition, assess the need for treatment and/or referral, and identify patient-specific factors that affect health, pharmacotherapy, and/or disease management.

- Competency 2.2.2: Determine whether a particular drug...is available on a nonprescription basis.

- Competency 3.2.3: Provide information regarding the documented uses, adverse effects and toxicities of dietary supplements.

Thus, the prospective pharmacist unable to fulfill these competencies would not be judged to be even minimally competent.

NABP updated the blueprint for NAPLEX in 2005.⁴ This major shift in emphasis on nonprescription products was preceded by an exhaustive survey of practicing pharmacists. Among the changes implemented were, "...treating over-the-counter and prescription products equally...."

A final argument for the importance of nonprescription products in pharmacy education is the attitude of the American Council on Pharmaceutical Education (ACPE). Every accredited pharmacy program is approved for accreditation by AACP using a set of standards and guidelines.⁵ Appendix B is titled "Additional Guidance on the Science Foundation for the Curriculum." ACPE stakeholders considered several areas "critical to the foundation and delivery of effective patient care" and stated that pharmacists must be knowledgeable and competent in those areas. They included: nonprescription drug therapies, dietary supplements, pathophysiologic and pharmacotherapy alterations necessary for nonprescription products when used in special populations (e.g., pediatrics, pregnant). ACPE also stated that advanced pharmacy practice experiences should include recommending of nonprescription medications, dietary supplements, and complementary and alternative therapies. By including nonprescription products to this extent, ACPE conveyed to each pharmacy program the importance of self-care education.

In summary, nonprescription product and device training and the concept of self-care is vital in the education of future pharmacists. Many pharmacists will work in community pharmacy, the primary venue for advising patients on nonprescription products and devices. Research demonstrates that many patients refuse to read labels, making the intervention of a learned intermediary potentially lifesaving. Powerful prescription medications constantly switch to nonprescription status; since there is no third class of drugs in the United States, the pharmacist is ideally positioned to counsel patients during the post-switch period. An educated pharmacist can counter marketing hype and

advertising intended to compel patients to purchase a product, when they may need another product or may require a visit to a trained professional. The creators of NAPLEX consider knowledge of self-care, nonprescription products, and professional triage to be components of minimal competency for the prospective pharmacist. Finally, the accrediting body for pharmacy schools and colleges requires education in nonprescription products and professional triage.

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