

**A REVIEW AND  
ANALYSIS OF  
CERTIFICATION  
SPECIALIZATION  
OPTIONS**

**SUMMARY REPORT**

**MODIFIED FOR PUBLIC  
DISTRIBUTION**

*Prepared for*

The Board of Pharmaceutical Specialties

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## INTRODUCTION

### Charge to Knapp & Associates, International

Knapp & Associates, International, Inc. (K&AI) was engaged in 2007 by the Board of Pharmaceutical Specialties (BPS) to conduct an analysis of a new framework for specialty certification proposed by the Certification Affairs Committee of the American College of Clinical Pharmacy (ACCP).<sup>1</sup> Late in 2008, the Committee's report was updated and transformed into a draft ACCP White Paper.<sup>2</sup> Both the report and White Paper advocated the development of a core specialty examination that would precede sub-specialty examinations (or other types of assessments). The White Paper defined the core as "a fundamental set of knowledge and skills that is common to all practicing pharmacists providing direct patient care."<sup>3</sup>

BPS requested that the analysis of the ACCP proposal be done by K&AI in terms of issues that would be raised for both BPS and the pharmacy profession if BPS adopted and implemented the proposal. BPS also requested that K&AI consider the proposal, as well as BPS's current framework for specialty certification, in the light of specialty certification models in other healthcare and non-healthcare professions and make recommendations to BPS accordingly.

K&AI worked with Richard Bertin, the Executive Director of BPS, to formulate two interview scripts: one for K&AI use with BPS board members and another for K&AI use with experts in the pharmacy and other healthcare professions.<sup>4</sup> The interviews were carried out during the summer of 2008.

### Structure of Report

The first part of this report addresses issues of specialty certification in general, and their relation to the pharmacy profession and BPS. The following topics are discussed:

- Characteristics of professional environments conducive to specialty certification
- How the profession of pharmacy relates to the characteristics of professional environments conducive to specialty certification
- Characteristics of successful specialty certification programs in general
- How BPS relates to the characteristics of successful specialty certification programs

The report then goes on to provide the following:

- Evaluations by the BPS Board and others of the proposals contained in the draft ACCP White Paper
- Recommendations to BPS from K&AI about the future conduct of specialty certification by BPS

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<sup>1</sup> "Certification Affairs Committee Report on the Evolution of Board Certification," (a confidential internal report prepared expressly for the ACCP Board of Regents), May, 2007

<sup>2</sup> ACCP White Paper (pre-publication draft), "Proposed Revision to the Existing Specialty and Specialist Certification Framework for Pharmacy Practitioners", n.d.

<sup>3</sup> ACCP White Paper, page 13

<sup>4</sup> See Appendix A of this report for the text of the interview scripts and a list of the interviewees. See Appendix B for a summary of the interviews.

## **SPECIALTY CERTIFICATION ISSUES RELATED TO THE PHARMACY PROFESSION AND BPS**

### **Professional Environments Conducive to Specialty Certification**

The opportunity to offer specialty certification in any profession arises from the advent of advanced practice that is differentiated from entry-level practice in terms of practitioner knowledge and skills, as well as the additional amount of experience required to put those knowledge and skills to appropriate use. In this kind of professional environment, licensure is unable to provide assurance of public safety beyond entry-level practice, although licensure examinations can, and usually do, change over time to encompass topics that would previously have been considered beyond entry level. For example, the rapidly emerging discipline of genomics and related patient-specific drug selection and dosing regimens are now included in several Competencies in the current NAPLEX Blueprint.<sup>5</sup>

In pharmacy, while advanced practice has been increasingly differentiated from entry-level practice, primarily due to the efforts of BPS, the number of advanced practitioners is still relatively small in relation to the number of basic practitioners. Compared, for example, to medicine, where 85% of licensed physicians are certified by at least one specialty board, the demand for specialty certification in pharmacy comes from a distinct minority, albeit growing, but not a majority.<sup>6</sup> And while licensure in pharmacy is unable to assure the public safety of many types of advanced practice, the NAPLEX has changed in recent years to put slightly more emphasis on assuring safe and effective pharmacotherapy and optimizing therapeutic outcomes (the majority of the examination), but much more emphasis on assuring safe and accurate preparation and dispensing of medications. Despite these changes, a pharmacy thought leader interviewed for this project believes that pharmacy students are better prepared than ever and are often disappointed by the low bar set by the NAPLEX.

To what extent the recent changes in the NAPLEX overlap the putative content of a core specialty examination for direct patient care advocated by ACCP is a critical issue in appraising the viability of such an examination. This issue cannot be pursued, however, until the *common* direct patient care elements of each of BPS's current specialty examination blueprints are identified and compared with the current NAPLEX blueprint – not only to check for overlap but to see if there are enough such elements to constitute a meaningful and psychometrically defensible examination.<sup>7</sup>

### **Characteristics of Successful Specialty Certification Programs**

A professional environment conducive to specialty certification is a necessary but not a sufficient requirement for the operation of successful certification programs. There are a number of other characteristics of certification programs that tend to facilitate success, although success is possible without a program having all of the following characteristics:

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<sup>5</sup> “The NAPLEX: Evolution, Purpose, Scope, and Educational Implications,” by David W. Newton, Maria Boyle, and Carmen Catizone, *American Journal of Pharmaceutical Education*, 2208 April 15; 72(2):33.

<sup>6</sup> According to the ACCP White Paper (p.11) 2.4 % of the overall pharmacist population in 2006 held a specialty board certification credential.

<sup>7</sup> A more rigorous approach would be to conduct a role delineation study of pharmacists who are involved in direct patient care versus pharmacists – operating at either higher or lower levels – who are not.

- Being the major provider of formal specialty recognition in the profession, rather than being just one of multiple providers
- Having specialty recognition ultimately driven by the market, i.e., employer, third-party payer, and consumer demand, rather than being driven mainly by the professional quest for credentials
- Aiding beneficial outcomes for consumers, while being cost-effective for employers
- Presenting a persuasive message to consumers about the importance to their welfare or well-being of having access to certified practitioners of the specialty and supporting the message by rigorous outcomes research
- Enjoying national acceptance of the specialty certification
- Being the recipient of strong demand by candidates for the certification, and, consequently, having high market penetration
- Having an assured, continuous source of candidates through an educational pipeline, including residencies
- Being well financed and run in a business-like manner. Programs are usually financed by fees from candidates for initial certification but also from candidate fees for recertification, fees from the sale of educational materials and funding from other sources.

### ***Being the major provider of formal specialty recognition in the profession***

A principal characteristic of successful specialty certifications is strong control exerted by the profession over the process of formal specialty recognition. Strong control may not prevent runaway specialty formation, but it reduces the prospect of narrower and narrower specialties achieving recognition through specialty certification. It also reduces the possibility of outright competition among one or more certifications in a single specialty or overlapping certifications in any given area of expertise.

Tight control over the process of formal specialty recognition in healthcare is exerted by the American Dental Association, the American Board of Physical Therapy Specialties, and the American Board of Veterinary Specialties. Specialties wishing to embark on specialty certification are required to submit to the relevant body a proposal for recognition that meets exacting requirements.<sup>8</sup> Medicine, which is often considered the gold standard for control over specialty certification, operates through the American Board of Medical Specialties (ABMS). While the ABMS recognizes just 27 specialty certification boards, many of these boards have created numerous sub-specialties that are subject to certification beyond the gateway certification. Additionally, there are well over 100 specialty boards in medicine that have organized themselves without the blessing of the ABMS. Not all of these boards, however, offer certification examinations – or certification examinations that have the rigor of the ABMS specialty board certifications.

In the case of dentistry there is a fundamental tenet that general dentistry is sufficient to treat a majority of patients, even those with special needs and problems. Because of this belief and a tight control of the recognition of specialties, there are only nine dental specialties, most of which were recognized prior to 1950.

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<sup>8</sup> Non-recognized specialty groups are encouraged, however, to develop and advance areas of interest through education, practice and research.

Loose control over the process of formal specialty certification exists in the profession of nursing, which has some 40 or more certifying bodies. This confusing proliferation of nursing specialties has not furthered the professionalization of nursing as was hoped and, generally, has not led to third-party-payer reimbursement for advanced recognition.

Tight control over the process of formal specialty recognition, while avoiding the problems inherent in specialty proliferation, has not automatically meant a lack of other problems. In medicine, for example, generalists have been devalued, and there has been a flight from primary care medicine.<sup>9</sup> In veterinary medicine, the academic orientation of the specialties (developed by “colleges”) has made specialties less attractive to “hands-on” veterinarians.<sup>10</sup>

Nonetheless, it has been generally advantageous to healthcare professions to keep tight control over the process of formal specialty recognition. BPS has been largely successful in keeping control of the process in pharmacy, although there have been a few attempts by other groups to recognize specialties and assess the competency of their practitioners. An example of an unsuccessful attempt is the Disease State Management program of the National Institute for Standards in Pharmacist Credentialing, which ceased operations at the end of 2008 for lack of support. By contrast, the certification in geriatric pharmacy, offered by the commission of the same name, continues to operate, albeit not as successfully as was predicted by the American Society of Consultant Pharmacists (ASCP), the developer of the program.

### ***Having specialty recognition ultimately driven by the market***

A second characteristic of successful specialty certification programs is that specialty recognition is ultimately driven more by the market, i.e., employer, third-party payer, and consumer demand, rather than by the profession. Market demand, provided it brings with it additional compensation for pharmacist services, creates a ready pool of applicants for specialty certification. Professional demand alone for a credential is almost always a weaker source of applicants for specialty certification than market demand. A major reason for the slow growth of BPS-issued credentials is that most of the growth has been fueled by those seeking professional recognition and satisfaction alone, without an assured mechanism for compensation.

### ***Aiding beneficial outcomes for consumers, while being cost-effective for employers***

A third characteristic of successful specialty certification programs is that their certificants can be shown to be essential to beneficial outcomes for consumers or that they at least enjoy the presumption of aiding such outcomes. Ideally, the employment of certificants should not only improve outcomes but also be cost-effective for employers.

The ACCP White Paper cites evidence that the provision of clinical pharmacy services has had a positive impact on the quality and outcomes of patient care in hospital and ambulatory practice settings, particularly where the pharmacist is a member of an inter-professional team. The White Paper also cites evidence that pharmacist-provided drug histories result in a large reduction of medication errors in hospitals.<sup>11</sup> However, the White Paper admits that “there is no universal

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<sup>9</sup> Interview conducted on September 11, 2008 by K&AI with Philip Bashook, Research Assistant Professor at the University of Illinois at Chicago.

<sup>10</sup> Interview conducted on September 12, 2008 by K&AI with Elizabeth Sabin, Assistant Director of the American Veterinary Medical Association’s Education and Research Division.

<sup>11</sup> ACCP White Paper, p. 4.

payment mechanism for these services,” which means that cost-effectiveness for employers has not yet resulted in a compensation structure that advances pharmacists to the status of revenue generators from simply being an overhead expense.<sup>12</sup> Employer compensation and reimbursement by third parties will continue to elude pharmacists until cost-effectiveness and positive outcomes are demonstrated by a significant body of research that is widely disseminated and known.

### ***Presenting a persuasive message to consumers about the importance of access***

A fourth characteristic of successful specialty certification programs is their ability to present a persuasive message to consumers about the importance of their having access to certified practitioners. In regard to the current BPS specialty certifications, there is no readily available evidence that the certifications have been persuasively marketed to consumers. One might argue, though, that the only important consumer understanding is the supposition – most obvious in medicine – that better pharmacy care would be available from certified specialists than from those who simply are licensed. Consumers, however, rarely have the opportunity to seek out certified pharmacy specialists, as they do in medicine and dentistry.

### ***Enjoying national acceptance of the specialty certification***

National acceptance of a certificate as valid for certain kinds of practice is a blessing for a specialty certification board. National recognition is usually in the private realm of employers and, potentially, insurers, and therefore not subject to government regulation, or, at times, can be in the public realm, where scores on certification examinations are used by states as part of licensure. For example, 35 states use as a criterion for licensure of radiologic technologists’ minimally-acceptable scores on the certification examinations of the American Registry of Radiologic Technologists. Acceptance of the certification by more or less all states without the imposition of significantly varying requirements is highly beneficial to both the efficient operation of the certification board and the convenience of certificants, who gain portability of their certification across state lines. BPS specialty certifications seem to be acceptable nationally for purposes of practice, albeit not necessarily for purposes of licensure or additional compensation.

### ***Being the recipient of strong demand by candidates for the certification***

Strong demand by candidates for a given certification is the driver that leads to high market penetration (or potential penetration) by the board in charge of the certification. Such demand is most often fueled by the prospect of higher compensation for certificants than for practitioners who remain uncertified. Strong demand also yields sufficient revenue to the certifying board to permit long range development activities. Unfortunately, BPS has only minor market penetration among potential candidates for certification in the specialties supported by BPS.

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<sup>12</sup> *Ibid.*

### ***Having an assured, continuous source of candidates through an educational pipeline***

The pool of potential certificants is maximized if there is an educational pipeline, particularly in professions where there are established residencies in the specialty. The good news for BPS is that the residency movement in pharmacy is increasing. According to Janet Teeters, Director of the Accreditation Services Division of the American Society of Health-System Pharmacists (ASHP), 19% of pharmacy graduates go on to an accredited PGY1 residency. Of the PGY1 residents, 22-25% go on to PGY2 residencies.<sup>13</sup> The number of residencies has significantly increased in the last two years.<sup>14</sup> Ms. Teeters predicts that, in the future, good clinical jobs in hospitals will require a prior residency. She believes that compensation for pharmacists with the experience of residency is already often higher than compensation for pharmacists who lack that experience, but she notes that this is not always the case. It would be useful to be able to put hard numbers on the salary advantages of residency, but authoritative data appear to be lacking.

ASHP requires, starting in 2009, that PGY2 program directors must be certified if BPS offers a relevant certification. Residents of PGY1 are encouraged by ASHP to seek BPS certification, especially in pharmacotherapy. There are numerous residencies, though, for which there is no corresponding BPS certification.<sup>15</sup> According to Ms. Teeters, among PGY2 programs specialization is most common in critical care, ambulatory care, oncology, and infectious diseases. Critical care is not currently subject to BPS certification. Oncology and infectious diseases are (the latter as an AQ under pharmacotherapy), and ambulatory care is in the process of becoming so.

### ***Being well financed***

Successful certification boards are well financed, usually by candidate demand for initial certification but sometimes from other sources as well. BPS is financially supported, basically, by candidate fees for initial certification and for recertification. In addition, BPS receives additional support from the American Pharmacists Association (APhA), which provides office space and basic administrative services. All other BPS expenses, e.g., salary and benefits, printing, telephone, psychometric services, are the responsibility of BPS. Any funds for long-term program development would need to be requested of APhA and justified. In the interviews of BPS board members conducted by K&AI,<sup>16</sup> almost all members expressed the opinion that the current BPS business model is sustainable in the *near* future, but needs to be rethought in terms of future BPS needs.

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<sup>13</sup> Interview conducted by K&AI on December 17, 2008.

<sup>14</sup> The current numbers of PGY1 and PGY2 residencies is 690 and 389, respectively, according to Ms. Teeters. See Appendix C for a graph depicting growth of residencies.

<sup>15</sup> There are also pharmacy specialties that are relatively new and not yet represented in residencies.

<sup>16</sup> Summer of 2008

## EVALUATIONS OF THE PROPOSALS IN THE DRAFT ACCP WHITE PAPER

### Summary of the Proposals

The ACCP White Paper proposes a new framework for BPS certification that elaborates on the proposed new framework in the earlier ACCP Certification Committee report. Both documents propose a new, “gateway” (K&AI’s term) specialty certification examination that would assess the knowledge and skills of pharmacists engaged in direct patient care. Both documents, therefore, would reclassify the current (and future) BPS specialty examinations as subspecialty examinations, to be taken, optionally, after the gateway examination – either the same day (as in the Committee report) or, possibly, as late as the next day (as in the White Paper).<sup>17</sup>

The Certification Committee report refers to the gateway examination as a “core knowledge/skills exam,” whereas the White Paper eschews the term “core” and refers simply to an “initial ‘fundamental’ certification.” Both documents, however, make clear that the content of the gateway examination should be based on the knowledge and skills required in the performance of direct patient care. Pharmacy licensure assures only “the competence needed in safe and effective drug distribution and the provision of a limited scope of patient care services (e.g., patient education and counseling),” but not the provision of clinical pharmacy services, such as medication therapy management.<sup>18</sup>

The purpose of a gateway certification would be not only to assure that certificants are qualified to provide direct patient care, but to provide it independent of practice setting or subspecialization interest. The precise domains for the gateway examination would be based on a role delineation study to determine the knowledge and skills that are needed for direct patient care across the most prevalent practice settings. It is anticipated that the knowledge and skills identified by the role delineation study would include domains that are already included in the current and proposed (i.e., ambulatory care) BPS specialty examinations. Most likely, according to the White Paper the following areas would be the potential content areas for the gateway examination:

- Patient-specific pharmacotherapy
- Retrieval, generation, interpretation, and dissemination of pharmacotherapy knowledge
- Practice management<sup>19</sup>

The White Paper also foresees the future identification of subspecialty areas being based on role delineation studies, the unstated assumption being that that BPS’s recognition of new subspecialty areas would not depend solely on proposals for new certifications from interests within the pharmacy profession. The White Paper is quick to note, however, that there would need to be a critical mass of pharmacists who would be potential certificants to assure the feasibility and sustainability of new certifications.<sup>20</sup> One possibility for helping to assure the feasibility and sustainability of both types of credentials, i.e., fundamental certification and subspecialty

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<sup>17</sup> Both documents imply that a candidate for both the gateway examination and one of the subspecialty examinations would take the latter without knowing whether he or she had passed the former. Neither document discusses what would happen if a candidate passes the subspecialty examination, but not the gateway examination – a problem that is avoided in a field like medicine, where the initial certification examination is widely enough separated in time from the more specialized certification examination that passing the former is a prerequisite to taking the latter.

<sup>18</sup> Quotation from Committee Report, p.2.

<sup>19</sup> ACCP White Paper, p. 13.

<sup>20</sup> *Ibid.*, p.14.

certification, would be the logical link the White Paper sees between PGY1 and the fundamental certification and between PGY2 and subspecialty certifications.<sup>21</sup> The paper does not make clear why a core/gateway credential would assure the sustainability of subspecialties. Another possibility to assure the sustainability of new certifications, not mentioned in paper, is to encourage and promote the growth of residencies. Subsequent to this growth should be the formation of an independent structure and organization, very much like the graduate medical education system which is structured and monitored by the Accreditation Council for Graduate Medical Education (ACGME).

Finally, the White Paper proposes that both types of certification be subject to recertification, according to procedures deemed most appropriate.<sup>22</sup>

### **Summary of the Rationale for the Proposals**

The White Paper proposals are premised principally on a series of “anticipations”:

- That there will be, in the next 10-15 years, an increased need for advanced pharmacy services, making increasing numbers of pharmacists responsible for providing patient care that ensures optimal medication therapy outcomes.
- That with these broadened responsibilities, pharmacists will need and seek additional training.
- That as a result of this additional training, there will be an increased need to expand the process of how specialized knowledge and skills are recognized.<sup>23</sup>

In regard to the increased need for advanced pharmacy services, the White Paper asserts that direct patient care activities are becoming more common in health care organizations, especially in hospital and ambulatory practice settings. Increasingly, pharmacists are being asked to provide services such as medication therapy management (MTM), and to serve as the “drug expert” on an inter-professional healthcare team. These same assertions, however, have a long, and mostly unfulfilled, history in pharmacy. In 1994, the APhA funded a project directed by K&AI to develop a certification for pharmacists in “pharmaceutical care” because it was thought the role of the pharmacist was moving rapidly from dispensing drugs to providing patient care and counseling as part of the healthcare team. There was no strong agreement on the content and purpose of the credential and whether the credential would be in demand, sustainable and gain the recognition of third party payers. During this same period of time, a credential was created in geriatric pharmacy for the same reason. This program has not experienced the participation that the American Society of Consultant Pharmacists had wished, and reimbursement for these services is not widespread.

The White Paper cites evidence that including pharmacists on inter-professional healthcare teams reduces the rate of medication errors and preventable adverse drug events. The need for pharmacists in these roles has been institutionalized by the Medicare Part D program, which requires that MTM be a component of the benefit structure for outpatient prescription drug programs.<sup>24</sup> This development is a major ray of hope for the inclusion of patient care and interaction

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<sup>21</sup> *Ibid.*, p.15.

<sup>22</sup> *Ibid.*, p.14.

<sup>23</sup> *Ibid.*, p.2.

<sup>24</sup> *Ibid.*, p.4.

as reimbursable by third parties. If more government regulation regarding payment to pharmacists for these services occurs, this will be a major driver for increased specialization.

The White Paper argues that as pharmacists move from “product-centered” care to “patient-centered” care, appropriate payment mechanisms for these advanced services will have to be established. Payers will require, though, validation that practitioners are qualified to provide such services. While the White Paper does not say where currently practicing pharmacists might acquire the knowledge and skills necessary to provide direct patient care, it does point to residency programs as an obvious source of training for new pharmacy graduates. The fact that the number of residency programs and enrollees is expanding (see p. 7 of this report) buttresses this argument. The White Paper is confident that a closer match between BPS certifications and PGY1 and PGY2 programs would further serve to expand the pool of pharmacists who are demonstrably able to provide direct patient care.<sup>25</sup> It should be noted, however, that residency programs might have their own imperatives that would make the links between the programs and BPS certifications less straightforward than the White Paper suggests.

In addition to these three anticipations, the White Paper proposals are underlain by antipathy to “a fractionation of the profession and [resultant] lack of understanding of the pharmacy credentialing process.”<sup>26</sup> The authors of the White Paper believe that there needs to be a single credential – in addition to a license – that is accepted by the entire profession “as reflective of a ‘pharmacist specialist’.” The authors assert that “healthcare providers, payers, and the public find it difficult to know what each [current BPS] credential actually means and its value relative to the other available credentials....”<sup>27</sup> No explanation, however, is offered as to why this is the case.

The authors extend their claim that a single credential would provide clarity to the world of pharmacist certifications by also seeing an important financial corollary: the likelihood that a single credential would eliminate the current monetary disincentive for pharmacists to seek certification. The authors believe that the lack of assured financial compensation – both personal and institutional – for current specialty certifications depresses the potential number of pharmacists who might seek these certifications. The authors predict that the creation of a single, gateway certification is “likely to promote more consistent payment for pharmacists’ direct patient care services.”<sup>28</sup>

### **Reactions of the BPS Board and Other Pharmacy Experts to a Core Examination**

The interviews that were conducted by K&AI with the BPS Board members and other pharmacy experts were based on the ACCP Certification Affairs Committee report, not the White Paper, which had not yet been published. As a result, the reactions that were solicited were to the proposed core certification and its relatively brief rationale, not to the more detailed proposals and rationales contained in the White Paper.

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<sup>25</sup> *Ibid.*, pp.4-5.

<sup>26</sup> *Ibid.*, p.19.

<sup>27</sup> *Ibid.*, p.7

<sup>28</sup> *Ibid.*, p.21.

Broadly speaking, the Board members and other pharmacy experts were wary of the proposal for a core exam. The fear was expressed that the core examination would differ only by degree from the licensure examination, and that the certification gained by success on the former would not be sufficiently more advanced than licensure to provide the benefits to the pharmacy profession predicted by ACCP. Skepticism was also expressed about whether the core, with its clinical focus, could encompass significant parts of all of the current specialty domains. Nuclear pharmacy was often cited as a specialty whose test blueprint would have relatively little overlap with the presumed test blueprint for the core examination. Some interviewees predicted that other specialties that might in the future be recognized by BPS would share the lack of connection to a common, clinical core, although other interviewees predicted that new specialties will arise from residencies and be basically clinical in orientation. One interviewee thought that the likelihood of a core body of knowledge and skills would increase as more pharmacy graduates opted for residencies.

Some interviewees hypothesized that a core examination, if it were implemented, would look very much like the current pharmacotherapy examination, thereby vitiating the need for that examination. The thought was also expressed that, eventually, pharmacotherapy will be considered more of a generalist certification (possibly core in patient care) than a specialty certification.

When asked about the potential value of a core credential, several members of the Board said they did not know what value it would have. A plurality of Board members said that the credential would have no value, but a few echoed the argument in the White Paper that the credential would establish a baseline standard that might become a requirement for advancement and higher salaries. Another few saw the value of the credential in the future, when pharmacists would be paid for patient care rather than just dispensing medication. They did not, however, posit a causal link, as the White Paper does, between the implementation of the credential and the receipt of additional pay.<sup>29</sup>

### **Agreement between the White Paper and the Interviews**

The lack of agreement among the interviewees about the feasibility and utility of a core credential should not obscure important points of agreement with the White Paper on related issues. A number of interviewees lamented the lack of connection between many pharmacy specialties and market demand. They cited the academic world of pharmacy rather than the market for specialized pharmacy expertise as the creator of demand for many specialty certifications. They also counseled, as does the White Paper, that BPS should look outwardly to employers, payers, and the healthcare system instead of inwardly to pharmacy as a profession for guidance about the creation of specialty certifications.

Both the White Paper and the interviewees agreed that the refinement of a structure for graduate education and an increase in the number and kinds of residencies were the next steps in the advancement of the professions on many fronts. There was also agreement about the utility of residencies for meeting the experience requirements to sit for a certification examination. The White Paper, however, concentrated on the clarity that residency fulfillment would bring to the candidate qualification process, as compared to the assessment of a candidate's years-in-practice. The interviewees were more concerned about whether residency should be a pre-condition to sit for

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<sup>29</sup> These observations are taken from K&AI's PowerPoint presentation of September 15, 2008 to BPS: "Review and Analysis of Specialty Certification Options: Update." Some of the observations, however, are augmented by material from K&AI's interview notes.

certification examinations, and were generally against the idea. Their reasons included the lack of match between existing residencies and some certification examinations and the possibility that prerequisites for a given examination might reasonably include more than residency. One Board member, sensitive to the fact that pre-requisites varied among BPS-sponsored examinations, advocated that there be a baseline of prerequisites for all examinations, but allowance made for additional requirements.

### **Proposals Related to Practices in other Healthcare Professions**

K&AI reviewed other healthcare professions to determine if they have a broad-based, fundamental certification as a prerequisite for more specialized certifications. The only profession it found that had such a system was medicine. Not surprisingly, the White Paper expresses kinship between its proposals and the medical board certification model.<sup>30</sup> While the White Paper acknowledges that the parallel is not exact, since there are 24 medical specialty boards recognized by the American Board of Medical Specialties (the analog to BPS in pharmacy), the White Paper concentrates on the fact that it is necessary for a candidate to pass a “general board examination” before taking a subspecialty examination in his or her area of practice. The difference, however, between what exists in medicine and what is recommended by the White Paper for pharmacy is that there is no *single*, gateway certification examination in medicine. In effect, physician licensure is the gateway to the various medical specialties, which is the same situation that currently exists in pharmacy. A closer parallel would exist if the BPS-recognized specialties each had a gateway examination as a prerequisite for a more specialized examination. One interviewee suggested that each BPS-recognized specialty does, in fact, have its own core of knowledge, in addition to more advanced knowledge, but that the core and advanced topics are combined in a single examination. For more about specialties in healthcare, see Appendix D.

### **RECOMMENDATIONS**

As a result of the foregoing discussion, K&AI recommends that BPS:

- Defend its primacy in pharmacy certification.
- Be proactive in assessing the potential of new certifications, including the direct patient care certification advocated by ACCP and the proposed ambulatory care certification, through market research.
- Develop a long-term strategic plan.
- Be proactive in finding funding sources for long-term development.
- Be aggressive in working with other pharmacy organizations to promote outcomes research and third-party reimbursement for direct patient care.

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<sup>30</sup> White Paper, pp. 15-16.

## **Defend BPS's Primacy in Pharmacy Certification**

Being almost the sole specialty certifier in pharmacy has great value to BPS in terms of control over a process that in some other healthcare professions with multiple sources of specialty recognition has become confusing and even detrimental to the advancement of the profession. BPS should defend its current primacy in pharmacy certification by being vigilant in the monitoring of potential or fledgling movements and efforts by other agencies, associations or boards that propose or offer different or competing certifications. BPS should also make sure that its Board includes representatives of major interests in pharmacy whose views about certification may be at variance with those of BPS so these interests can participate in decision-making, thus promoting transparency.

## **Be Proactive in Exploring Potential New Certifications**

BPS needs to be proactive in exploring potential certifications that employers and third-party payers would find valuable and for which they would be willing to provide additional compensation for certificants and additional reimbursement to institutions for services rendered. BPS should not merely be the passive recipient of proposals from organized interests in pharmacy for new certifications.

To become proactive, BPS needs to mount a market-research effort aimed at providing information to its Board about near-term and longer-term trends in the technology, organization, and financing of healthcare, as these trends impinge on the delivery of pharmacy services – provided such research has not already been done and made public by other organizations, or is not already in process. To the extent that BPS can be the beneficiary of such research, its own efforts can concentrate on the identification of the *post-licensure* knowledge and skills that will be necessary for pharmacists to cope with, and thrive in, a rapidly changing healthcare environment. BPS can then determine the extent of the potential market for individuals certified as possessing such knowledge and skills, and whether the certified possessor is likely to receive additional compensation and his or her employer additional reimbursement. BPS should also enter into discussions with PGY1 and 2 residency directors about what they perceive to be their currently unmet needs for specialty certifications.

BPS cannot wait, though, for the results of the market research before testing the hypothesis of ACCP that a basic, direct patient care certification would be valued by employers, to the point where holders of such a certification would be in high demand and paid more than pharmacists who are simply licensed. The reason that BPS cannot delay testing ACCP's hypothesis is because the establishment of a basic, direct patient care certification could, as ACCP suggests, create a substantial new candidate demand, and, not incidentally, substantially improve BPS's finances. In this hypothesis testing, BPS should consider the relationship between the direct patient care certification and the proposed ambulatory care credential. Creating overlapping credentials cannot help but to further "credential confusion" and fragmentation in the pharmacy profession.

To test the ACCP hypothesis would require a study to confirm not only that pharmacists in a variety of settings are increasingly providing direct patient care (as ACCP reasonably asserts), but that this trend will continue to grow at a rapid rate, that there is, or will be, a shortage of pharmacists who possess the direct patient care credentials wanted by employers, and that employers are/will be prepared to

appropriately compensate the holders of such credentials. The study should also assess the willingness of third-party payers to reimburse institutions for the provision of direct patient care by pharmacists, as well as the need of third-party payers to assure the competency of such direct patient care providers by requiring an appropriate certification.<sup>31</sup>

In addition, BPS would need to address the issue of whether current or future specialty certifications (subspecialty certifications in ACCP's proposed new framework) would likely be devalued by a lower level, broadly popular, direct patient care certification. "Devalued" in two senses: a perceived reduction in need among potential candidates for subspecialty certification and a loss of significant examination content from subspecialty examinations to the lower level examination. BPS would also need to address the issue of whether recent or anticipated changes in the NAPLEX would tend to close the distance between that examination and a certification examination in direct patient care.<sup>32</sup>

### **Develop a Long-Term Strategic Plan**

No organization of any size today can reasonably secure its future without having a strategic plan in place. A strategic plan is not a permanent document that is put on a shelf to gather dust. A good strategic plan is supple and revisited – possibly revised – at regular intervals. Most strategic planning today starts with the identification of key organizational success factors and applies them to a *variety* of possible future scenarios for the organization's business. There is not just one future scenario that is chosen and assumed to be the way the future will unfold. Several scenarios, with varying degrees of probability are identified, so that an organization can consider how well prepared it would be if the scenario identified as the most probable did not, in fact, turn out to be the future.

BPS needs to engage in strategic planning, with the help of someone who is expert in guiding the development of a strategic plan using a scenario based approach. If there are futures that BPS would like to see come to fruition, an action plan should be devised and implemented to make that future more likely. The action plan might include joint activities with other organizations in pharmacy, particularly on large issues like the inclusion of certified pharmacists on patient care teams and their reimbursement for providing clinical services.

### **Be Proactive in Finding Funding Sources for Long-Term Development**

Part of strategic planning involves an analysis of current and future sources of revenue – both existing and potential – and estimates of revenue in future years. These are especially important issues for BPS to address, since BPS is required to return to APhA net revenue over the expenses for which BPS is responsible, these expenses include an overhead fee for office space and basic administrative services provided to BPS by APhA. The result of this arrangement is that there is little or no money immediately available to BPS for long-term program development.

Almost all of BPS's Board members said during their interviews with K&AI that the current BPS business model was financially sustainable for the near future, but they expressed concern about the

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<sup>31</sup> The ambulatory care proposal for a BPS certification in that field presents evidence that 42% of pharmacy practices currently bill third parties for clinical services. Twenty-six percent of pharmacy practices currently collect cash payments from patients who receive clinical services. The issue of third-party reimbursement for pharmacist services, especially the difficulty of obtaining it, is given searching treatment in an article by Julie M. Ganther, Ph.D., R.Ph. in the *Journal of the American Pharmacy Association* 42(6):875-879, 2002.

<sup>32</sup> In this regard, see the discussion at the top of page 3 of this report.

long-term financial future of BPS if there continues to be a dearth of money for program development and various outreach and marketing activities. For this reason, the majority of the Board expressed the view that BPS should ultimately be independent of APhA.

K&AI recommends that BPS be proactive in finding funding sources for long-term program development and expanded marketing – perhaps foundation grants that might even include the APhA Foundation which is independent of the membership organization. Ultimately, however, BPS will need to renegotiate the terms of its relationship with APhA, which has, over the years, gone from APhA subsidizing BPS to the reverse. The possibility of APhA funding long term program development and expanded marketing should also be explored.

### **Work with Other Pharmacy Organizations to Promote Outcomes Research and Third-Party Reimbursement**

While BPS cannot be directly involved in lobbying efforts, it needs to be aggressive in working with other pharmacy organizations that are in the forefront of the drive to secure third-party reimbursements. In addition, BPS could also work with sister specialty societies in doing research regarding patient outcomes and compensation in those positions where certified pharmacists have a role in patient care. BPS has an important data base that could be mined for research studies. K&AI believes that if BPS can implement the five major recommendations stated on page 11 of this report and subsequently discussed in greater detail, the future of the organization could be very bright.

**APPENDIX A**  
**Interview Scripts and Interviewees**

## **INTERVIEW SCRIPT FOR BPS BOARD MEMBERS AND OTHER OPINION LEADERS IN PHARMACY**

### Pharmacy specialization and BPS's role:

1. What is the likely future of specialized practice in Pharmacy?
  - Is specialization likely to grow? If so, how and in what ways?
  - Stay the same? Credentials discontinued?
2. Should the Board of Pharmaceutical Specialties (BPS) continue playing the same role in specialization and use the same procedures for recognizing specialties in the future as it has in the past?
  - If not, how should BPS's role be redefined?
3. Has there been a demand from the "market" for Pharmacy credentials (e.g., employers, potential certificants, healthcare system) to change the current framework or model for specialization?
  - If so, how should the process be changed to meet the needs of the market? What would be the rationale for the change?
4. What should be the relationship between residency training in Pharmacy and specialty certification?
5. [Question for BPS Board members only: Is BPS's current business model financially sustainable?
  - Why or why not?
  - Are there other models that would lead BPS to be more successful financially? ]

### Current and potential examination models for specialty certification in pharmacy:

5. Please briefly evaluate the pros and cons of the following models. Try to note the most critical pros and cons.

Option	Pros	Cons
1. Separate and discrete certification examinations for each specialty (existing model)		
2. Separate and discrete certification examinations for each specialty, but with sharing of “item banks” (questions) across examinations, as appropriate (slight change from the existing model)		
3. A common certification examination for <u>all</u> specialties that would serve as a prerequisite for one or more subspecialty certification examinations that could be taken, immediately after the common examination or at the certificant’s option, at some future time. <u>A credential would be awarded for passing the common examination, in addition to credentials being awarded for passing subspecialty examination(s).</u>		
4. A common certification examination for all specialties, as described above, followed, immediately or at the certificant’s option, at some future time, by a portfolio or other type of non-examination review of knowledge and skill in a subspecialty area. <u>A credential would be awarded for passing the common examination.</u> The non-examination review would award to the successful candidate something similar to BPS’s Added Qualifications (AQ)		

### Content and value of a core credential

Please respond to the following regarding the options 3 and 4 above.

6. What is the likelihood that a core body of knowledge exists at a higher level than that required for licensure and, at the same time, one that is relevant to virtually all subspecialties?
7. What would most likely be the major content of a common certification examination?
8. What value would a credential based solely on a common certification examination be for pharmacists and for the pharmacy profession? What would it designate?
9. What affect would a core credential have for the role and functions performed by licensed (not certified) pharmacists in general practice?

### In summary:

10. If you could develop a zero-based model for defining and recognizing specialties in pharmacy today what would that model be?

Thank you for your time.

**INTERVIEW SCRIPT FOR EXPERTS IN  
MEDICINE, DENTISTRY, NURSING, PHYSICAL THERAPY AND VETERINARY MEDICINE**

1. Briefly, how and why did specialization develop in your profession? What event or situation was the major impetus for developing specialties?
  - Are there publications you would recommend that would provide more detail about this trend?
2. Is the demand for specialization growing in your profession?
  - Why or why not?
  - What are the major drivers for specialty certification? Certificants? Consumers? Employers? Technology? The profession itself?
3. Briefly, what mechanisms exist in your profession for recognizing specialties as they develop?
  - Have these mechanisms changed over time? If so, what caused these changes
  - When was a specialty last recognized?
  - What role has board certification played in assuring continuing competency?
    - Is there published evidence of the efficacy of board certification in assuring continuing competency in your profession?
4. Have there been positive or negative consequences concerning how your profession has dealt with specialization?
  - What are the major criticisms of your model on the part of stakeholders:
    - Candidates?
    - Regulators?
    - Employers?
    - Consumers?
    - Educators?
    - The profession itself?
5. If you could develop a zero-based model for defining and recognizing specialties in your profession today what would that model be?
6. What has been the relationship in your profession between licensure and specialty certification?
7. Does your profession have residency programs? If so, what has been the relationship between residency programs and specialization
  - Are residencies accredited
  - Must accredited residency programs be a precondition for eventually taking a specialty certification exam?

Thank you for your time.

**BOARD OF PHARMACEUTICAL SPECIALTIES  
2008 MEMBERS**

Jannet Mari Carmichael, PharmD, BCPS (2009)[Chair]

Sharon M. Durfee, BS, BCNSP (2008)

(Ex officio - Chair of Specialty Council on Nutrition Support Pharmacy)

Sandra Edwardson, PhD, RN (2010)

Rebecca S. Finley, PharmD (2010)

Rex W. Force, PharmD, BCPS (2008)

(Ex officio - Chair of Specialty Council on Pharmacotherapy)

Susan Goodin, PharmD, BCOP (2008)

(Ex officio - Chair of Specialty Council on Oncology Pharmacy)

George H. Hinkle, MS, BCNP (2008)

(Ex officio - Chair of Specialty Council on Nuclear Pharmacy)

John E. Murphy, PharmD (2008)

A. Jeffrey Newell, RPh (2008)

Maria Llana Posey, PharmD, BCPP (2008)

(Ex officio - Chair of Specialty Council on Psychiatric Pharmacy)

Marsha A. Raebel, PharmD (2009)

Terry L. Schwinghammer, PharmD, BCPS (2010) [Vice Chair]

David A. Swankin, JD, Esq. (2008)

Edward Westrick, MD, PhD (2009)

## **Pharmacy Association Executives**

John Feather, PhD  
Executive Director and CEO  
American Society of Consultant Pharmacists

John A. Gans, PharmD.  
Executive Vice President and CEO  
American Pharmacists Association

Michael S. Maddux, PharmD  
Executive Director, American College of Clinical Pharmacy

Lucinda L. Maine, PhD  
Executive Vice President  
American Association of Colleges of Pharmacy

Henri R. Manasse, Jr., PhD, ScD  
Executive Vice President and CEO  
American Society of Health-Systems Pharmacists

## **Healthcare Experts outside Pharmacy**

Bonnie Niebuhr  
Chief Executive Officer  
American Board of Nursing Specialties

Elizabeth Sabin  
Assistant Director, Education and Research Division  
American Veterinary Medical Association

Philip G. Bashook  
Research Assistant Professor  
Department of Medical Education

Laura M. Neumann  
Senior Vice President  
American Dental Association

David G. Greathouse  
President, Board of Directors  
Journal of Orthopedic & Sports Physical Therapy

**Appendix B**  
**Summary of Interviews**

## SUMMARY OF INTERVIEWS WITH BPS 2008 BOARD MEMBERS

Note: Twelve of the fourteen Board members were interviewed.

### Pharmacy specialization and BPS's role:

6. What is the likely future of specialized practice in Pharmacy?

- Is specialization likely to grow? If so, how and in what ways?
- Stay the same? Credentials discontinued?

\*Ten members thought specialization was likely to grow. Two thought growth was a matter of speculation, and one expressed the “hope” that specialization would grow. Those who hazarded a guess (a minority of the members) about which areas of practice would be most fruitful for specialization pointed to two: pharmacotherapy and patient care, e.g., ambulatory care.

7. Should the Board of Pharmaceutical Specialties (BPS) continue playing the same role in specialization and use the same procedures for recognizing specialties in the future as it has in the past?

- If not, how should BPS's role be redefined?

\*All members thought that BPS's role was indispensable. One said that BPS should be the only specialty board in pharmacy. Almost all thought that BPS procedures were fine, especially if they continue to change over time in response to new issues. One said, however, that BPS's procedures were too passive -- waiting for specialties to come forward rather than being pro-active in assessing what specialties are needed.

8. Has there been a demand from the “market” for Pharmacy credentials (e.g., employers, potential certificants, healthcare system) to change the current framework or model for specialization?

- If so, how should the process be changed to meet the needs of the market? What would be the rationale for the change?

\*The great majority of members thought there was little or no demand from the market. A few thought there was a small, or slowly growing, demand. Of these, one thought that the small demand was from the profession itself. Another thought there was slowly growing demand in healthcare systems, particularly in pharmacotherapy.

9. What should be the relationship between residency training in Pharmacy and specialty certification?

\*A range of opinions were expressed, albeit almost all favorable to some kind of relationship between residency and certification. Several members expressed unambiguous support for residency being a prerequisite for certification. Others agreed in theory, but pointed out that if a specialty is new, residency programs need time to catch up; also, there

are residency programs for which there are no specialty certifications. Still others felt that residency should be just one of several possible criteria that would make the prerequisites for certification more stringent. One member said flatly that residency should not drive the creation of new specialty examinations, unless warranted. Another expressed the opinion that BPS should have a consistent baseline of prerequisites for all examinations, but allow additional requirements for any given specialty.

10. Is BPS's current business model financially sustainable?

- Why or why not?
- Are there other models that would lead BPS to be more successful financially?

\*Almost all members felt that the current business model was financially sustainable in the *near* future. One member pointed out, though, that Pharmacotherapy, the largest volume examination, is supporting the smaller volume examinations and that this model has clear limitations vis-à-vis additional small volume examinations. Many members expressed concern, however, about the *long-term* financial future, and suggested that this needs to be reexamined in light of BPS' anticipated growth across the profession.

Current and potential examination models for specialty certification in pharmacy:

5. Please briefly evaluate the pros and cons of the following models. Try to note the most critical pros and cons.

<b>Option</b>	<b>Pros</b>	<b>Cons</b>
<p>5. Separate and discrete certification examinations for each specialty (existing model)</p>	<p>*System has worked.                      *Qualifications to sit are good.                      *Specialties are well delineated.                      *Only one exam – minimal complexity.</p>	<p>*System is expensive, because it requires 5 separate councils.                      *System is expensive, because updated exams are required each year.                      *No core certification for all specialties.                      *Recert requirements differ significantly.</p>
<p>6. Separate and discrete certification examinations for each specialty, but with sharing of “item banks” (questions) across examinations, as appropriate (slight change from the existing model)</p>	<p>*Increases efficiency.</p>	<p>*Not clear how much money can be saved.                      *Sharing not possible for exams like Nuclear.                      *Learning curve required.                      *Could increase exam security issues.</p>
<p>7. A common certification examination for <u>all</u> specialties that would serve as a prerequisite for one or more subspecialty certification examinations that could be taken, immediately after the common examination or at the certificant’s option, at some future time. <u>A credential would be awarded for passing the common examination, in addition to credentials being awarded for passing subspecialty examination(s).</u></p>	<p>*Everyone has to meet a common standard.                      *Common exam would facilitate maintenance of certification.                      *Common exam might attract old-timers with high skill levels.</p>	<p>*Difficult to distinguish common exam (“pharmacy lite”) from licensure.                      *Differential amenability to a common exam: Pharmacotherapy the most, Nuclear the least.                      *Additional hurdle of common exam might decrease the number of candidates.                      *Appearance of a money making machine                      *Common exam not linkable to residencies.</p>

Option	Pros	Cons
<p>8. A common certification examination for all specialties, as described above, followed, immediately or at the certificant's option, at some future time, by a portfolio or other type of non-examination review of knowledge and skill in a subspecialty area. <u>A credential would be awarded for passing the common examination.</u> The non-examination review would award to the successful candidate something similar to BPS's Added Qualifications (AQ)</p>	<p>*Diminishes the appearance of proliferating specialties.</p>	<p>*No agreement on definition of a portfolio (could just be "dear diary").            *Portfolio reviews do not have same credibility with public as exams.            *Goes against role delineation.            *Awkward and complicated            *Would work for clinically-based specialties but not technology-based.            *AQ's have not taken off yet.</p>

Content and value of a core credential

Please respond to the following regarding the options 3 and 4 above.

11. What is the likelihood that a core body of knowledge exists at a higher level than that required for licensure and, at the same time, one that is relevant to virtually all subspecialties?

\*Most members thought that the only core body of knowledge was clinical, which would not be suitable for Nuclear or other potential specialties (not necessarily technological) that might seek BPS recognition in the future. One member thought that the likelihood of a core body of knowledge would increase as more pharmacy graduates opted for residencies. Another pointed out that each specialty has its own core body of knowledge.

12. What would most likely be the major content of a common certification examination?

\*Members who answered this question broadly said the content would be clinical, mostly Pharmacotherapy. One said the domains would be the same as in the licensure exam. Members who answered this question in detail gave a laundry of topics: evidence-based medicine, bio-statistics, knowledge of common diseases, federal drug laws (at a higher level than licensure), drug literature evaluation, institutional review boards, medication safety, healthcare institution policies and procedures, U.S. healthcare policies and systems, therapeutics, the clinical use of drugs, monitoring, specifying acceptable outcomes, drug interactions.

13. What value would a credential based solely on a common certification examination be for pharmacists and for the pharmacy profession? What would it designate?

\*Several members said they didn't know. A plurality said "none". One saw such a credential as being detrimental to the profession – putting it back into the quagmire of two standards (baccalaureate vs. Pharm. D.). Among the few who saw value in the credential, one said that it would establish a baseline standard that might become a requirement for

higher salaries and advancement, and also increase job satisfaction. Another saw the value of the credential as being in the future, when pharmacists would be paid for patient care rather than just dispensing. He elaborated by saying that the credential would be the equivalent of PGY 1 in terms of the holder being able to provide patient care, and would allow more pharmacists to gain a credential as a step toward specialization.

14. What affect would a core credential have for the role and functions performed by licensed (not certified) pharmacists in general practice?

\*A number of members hazarded a guess. A few thought the credential would create a two-tiered profession, with the possibility of the scope of practice of licensed-but- not-certified pharmacists being reduced. One said that the credential would suggest that the licensure exam is broken, although there is no evidence to that effect, particularly for retail pharmacists. Another thought that licensure is already somewhat devalued, with the possibility that most of the work of licensed pharmacists could be done by Pharmacy Technicians. That person went on to say that licensure needs to be retained for legal and regulatory reasons, but that certification should be driven by the profession.

In summary:

15. If you could develop a zero-based model for defining and recognizing specialties in pharmacy today what would that model be?

\*About half the members predicted that something like the present BPS system would be created under conditions of zero-based modeling, although a few suggested tweaks: a practical exam, a tighter link between residency and specialty certification. Among those who would create a different system, one opted for a common certification exam prior to a specialty certification exam (option 3 in the table above); another thought that there should be a common certification with added qualifications that did not create separate and distinct specialties. A third thought that it would be better if the need to improve patient care dictated the formulation of specialties – might make employers more willing to pay for specialty services – rather than groups of specialty practitioners requesting recognition themselves. A fourth thought that certification should be based on what you practice, not where you practice.

## SUMMARY OF INTERVIEWS WITH PHARMACY EXPERTS OUTSIDE BPS

Note: Five pharmacy experts outside BPS were interviewed by JEK.

### Pharmacy specialization and BPS's role:

11. What is the likely future of specialized practice in Pharmacy?

- Is specialization likely to grow? If so, how and in what ways?
  - Yes, but maxed out on certification for personal fulfillment.
  - New specialties likely to arise from the 15-20 types of residencies, although almost all clinical.
  - Payers also key; they are starting to pay for specialty certification, e.g., geriatrics, or equivalent training, but progress is slow.
  - Medical specialists want to partner with pharmacist specialists on patient care teams; evidence is accumulating that outcomes are better and costs go down.
  - In the next 20 years likely to see demand for pharmacists specializing in health information technology, not just clinical. Demand may also be for multi-disciplinary credentials.
- Stay the same? Credentials discontinued?
  - Pharmacotherapy likely to come into question. Too much a generalist certification. Demand will be for narrower expertise.

12. Should the Board of Pharmaceutical Specialties (BPS) continue playing the same role in specialization and use the same procedures for recognizing specialties in the future as it has in the past?

- If not, how should BPS's role be redefined?
  - Role generally OK, but BPS needs to market itself better, cut the red tape in recognizing specialties, and provide a broader set of specialty certifications that are more responsive to healthcare needs and, perhaps, easier to obtain.

13. Has there been a demand from the "market" for Pharmacy credentials (e.g., employers, potential certificant, healthcare system) to change the current framework or model for specialization?

- If so, how should the process be changed to meet the needs of the market? What would be the rationale for the change?
  - BPS needs to look outward to employers and healthcare systems, instead of inward toward the pharmacy profession to become more responsive to the market.

14. What should be the relationship between residency training in Pharmacy and specialty certification?

- Needs to be better articulated, especially with the development of residencies that are focused on patient care but have no analog in BPS certification.

Current and potential examination models for specialty certification in pharmacy:

Only one individual responded directly to the table. That person’s comments are quoted.

5. Please briefly evaluate the pros and cons of the following models. Try to note the most critical pros and cons.

Option	Pros	Cons
1. Separate and discrete certification examinations for each specialty (existing model)	Well defined, recognition of specialties, good model, rigorous process	May not be best model for next 30 years. Current system does not provide mechanism for certifying those that have completed residencies.
2. Separate and discrete certification examinations for each specialty, but with sharing of “item banks” (questions) across examinations, as appropriate (slight change from the existing model)	No brainer, lot of coordination, if there really is common domain, core drug therapy knowledge.	
3. A common certification examination for <u>all</u> specialties that would serve as a prerequisite for one or more subspecialty certification examinations that could be taken, immediately after the common examination or at the certificant’s option, at some future time. <u>A credential would be awarded for passing the common examination, in addition to credentials being awarded for passing subspecialty examination(s).</u>	<p>Doctor of Pharmacy degree                      Attractive option, PGY1-core and then PGY2- as they go through residency                      Core is clinical pharmacists and the second exam clinical pharmacist specialist                      Yes, linked to residency.                      E.g. formal, standardized advanced training                      Licensing Much more clinically oriented,                      Minimally competent level                      Licensure gets you into the residency program. Build additional knowledge and experience.                      Will help us document competence.</p>	<p>Naming these designations is an issue                      No downside from a patient perspective. Only has upside.                      However there is a manpower shortage.                      Reduced the supply because people are going off into directions</p>

Option	Pros	Cons
<p>4. A common certification examination for all specialties, as described above, followed, immediately or at the certificant's option, at some future time, by a portfolio or other type of non-examination review of knowledge and skill in a subspecialty area. <u>A credential would be awarded for passing the common examination.</u> The non-examination review would award to the successful candidate something similar to BPS's Added Qualifications (AQ)</p>	<p>AQ's was a good bridge when we had a limited number of specialists. Not adequate. Want an exam portfolio not as rigorous as an exam. What we have now AQ is a good process but if we have a critical mass we need to have #3 instead.</p>	

Content and value of a core credential

Please respond to the following regarding the options 3 and 4 above.

16. What is the likelihood that a core body of knowledge exists at a higher level than that required for licensure and, at the same time, one that is relevant to virtually all subspecialties?
  - a. Yes, there are some common elements, but there is a sweet spot for this area of practice.
  
17. What would most likely be the major content of a common certification examination?
  - o Pharmacotherapy would be foundational, but the exam would have to be broader than that.
  
18. What value would a credential based solely on a common certification examination be for pharmacists and for the pharmacy profession? What would it designate?
  - o Common exam all clinical, higher level, more rigorous, more clinical.
  
19. What affect would a core credential have for the role and functions performed by licensed (not certified) pharmacists in general practice?
  - o Technician certification, licensing exam, certificate programs..., broad specialization

In summary:

20. If you could develop a zero-based model for defining and recognizing specialties in pharmacy today what would that model be?
  - o Where are the big safety and quality problems in medication use? What are the drivers that elucidate these problems? There has to be a social significance. Medication errors, not getting prescriptions filled, noncompliance, mega pharmaceutical use a huge cause of hospitalization.

Macro view, within the medical model, what do we need in the emergency room, pediatrics, psychiatry. Appropriate drug use..the pharmacist's role.

Let's look at the medical specialties. Working with board certified surgeons...they know nothing about drugs. Technician...supply and fulfillment distribution.

Technicians...intravenous drugs.

- Focused areas Does it have a body of knowledge. Most pharmacists do not want to do nuclear pharmacy and infusion. Is there a need? Do the payers want this? Some areas make a lot of sense. Takes 6 years to get a new cert in the field. Who is going to be able to pay for this?
- I don't see pharmacy needing specialties. Pharmacists have a great education but not in delivering care. Nurses poor educational system but providing care. Need to break the business model. We started out with 2 degrees. PharmD D. education, research, some practice. People began to hire them because they could do clinical work. Kaiser started paying pharmacists to do this work. As more schools had the Pharm. D. and turning this out. They wanted something more. I hope that we get there. BPS is not there yet. Pharmacotherapy. Says that's us. Hospice patients.
- Postgraduate credentialing would function together in a common platform. What we have does not make sense. Council on Credentialing can't make sense of it.

## SUMMARY OF INTERVIEWS WITH EXPERTS IN MEDICINE, DENTISTRY, NURSING, PHYSICAL THERAPY AND VETERINARY MEDICINE

8. Briefly, how and why did specialization develop in your profession? What event or situation was the major impetus for developing specialties?
- Specialization developed in human medicine and dentistry early in the 20<sup>th</sup> century, followed by veterinary medicine in the 1950's and physical therapy in the 1970's.
  - Impetus for specialization differs somewhat from profession to profession, but following appear to be common:
    - Need to protect the public from quacks
    - Desire to have specialty training recognized and compensated accordingly
  - Are there publications you would recommend that would provide more detail about this trend?
9. Is the demand for specialization growing in your profession?
- Yes and no. The demand for specialties to be recognized by authoritative bodies, e.g., ABMS, ABVS, has cooled in human medicine, dentistry, veterinary medicine, and physical therapy. Partly that is because the requirements to be recognized by these bodies are rigorous, and many groups that would like to be recognized cannot meet the requirements. However, the urge to be recognized has steadily expanded and often found other outlets. There are estimated to be 150 certification boards in human medicine operating outside the aegis of ABMS. There is some tendency for groups that are expert in a technique to self-define themselves as a specialty, and within recognized specialties, there has been a proliferation of sub-specialties, e.g., the case of internal medicine.
  - Why or why not?
  - What are the major drivers for specialty certification? Certificants? Consumers? Employers? Technology? The profession itself?
    - Most often it is the profession itself, especially as increasing amounts of training and expertise are needed to do certain work. Money is also a powerful driver, as specialists can usually expect higher compensation than generalists.
    - The public also plays a role, with its appetite for the best care available – even for pets – and assurance of practitioner competency.
10. Briefly, what mechanisms exist in your profession for recognizing specialties as they develop?
- In human medicine, the American Board of Medical Specialties; in dentistry, the American Dental Association; in veterinary medicine, the American Board of Veterinary Specialties; in physical therapy, the American Board of Physical Therapy Specialties.
  - The American Board of Medical Specialties appears to be held in especially high regard as a model for how the professions should deal with specialty recognition.
  - Have these mechanisms changed over time? If so, what caused these changes
  - Broadly speaking, the only changes have been to internal procedures promulgated by these specialty recognition gatekeepers.

- When was a specialty last recognized?
  - In human medicine, 1979; in dentistry, 2000; in veterinary medicine, 1993; in physical therapy, 2007 (the first since 1992)
- What role has board certification played in assuring continuing competency?
  - Recertification is required by the recognized specialties in human medicine, dentistry, and physical therapy. In veterinary medicine, only three or four of the 20 specialties require recertification, but it is definitely an issue.
    - Is there published evidence of the efficacy of board certification in assuring continuing competency in your profession?
      - Hard evidence appears to exist only in human medicine – the evidence first provided by the colorectal surgeons, but slowly being augmented.

11. Have there been positive or negative consequences concerning how your profession has dealt with specialization?

- In all four professions, a positive consequence has been the improvement of patient care, or at the very least the increased availability of advanced care.
- Negative consequences appear to be profession-specific. In human medicine, for example, the work done by generalists has been devalued, and there has been a flight from primary care medicine. In veterinary medicine, for example, the academic orientation of the specialty organizations (“colleges”) has made specialty certification less attractive to many “hands-on” veterinarians.

- What are the major criticisms of your model on the part of stakeholders:

Candidates?

- The process of specialty certification is stressful and expensive.
- There should be a practical exam, not just a written one.

Regulators?

- Lack of sufficient control. Not clear that new specialties are created in response to patient care issues, as opposed to practitioner turf and compensation issues.

Employers?

Consumers?

- Proliferation of specialties increases confusion about the distinctions among them. In human medicine, the confusion is compounded by the distinction between board-eligible and board-certified.

Educators?

- In human medicine, pressure to specialize too early.

The profession itself?

12. If you could develop a zero-based model for defining and recognizing specialties in your profession today what would that model be?

- Suggestions varied by profession. Only commonality (between human medicine and veterinary medicine) was the perception that more stakeholders needed to be involved in the process of recognizing specialties.

13. What has been the relationship in your profession between licensure and specialty certification?

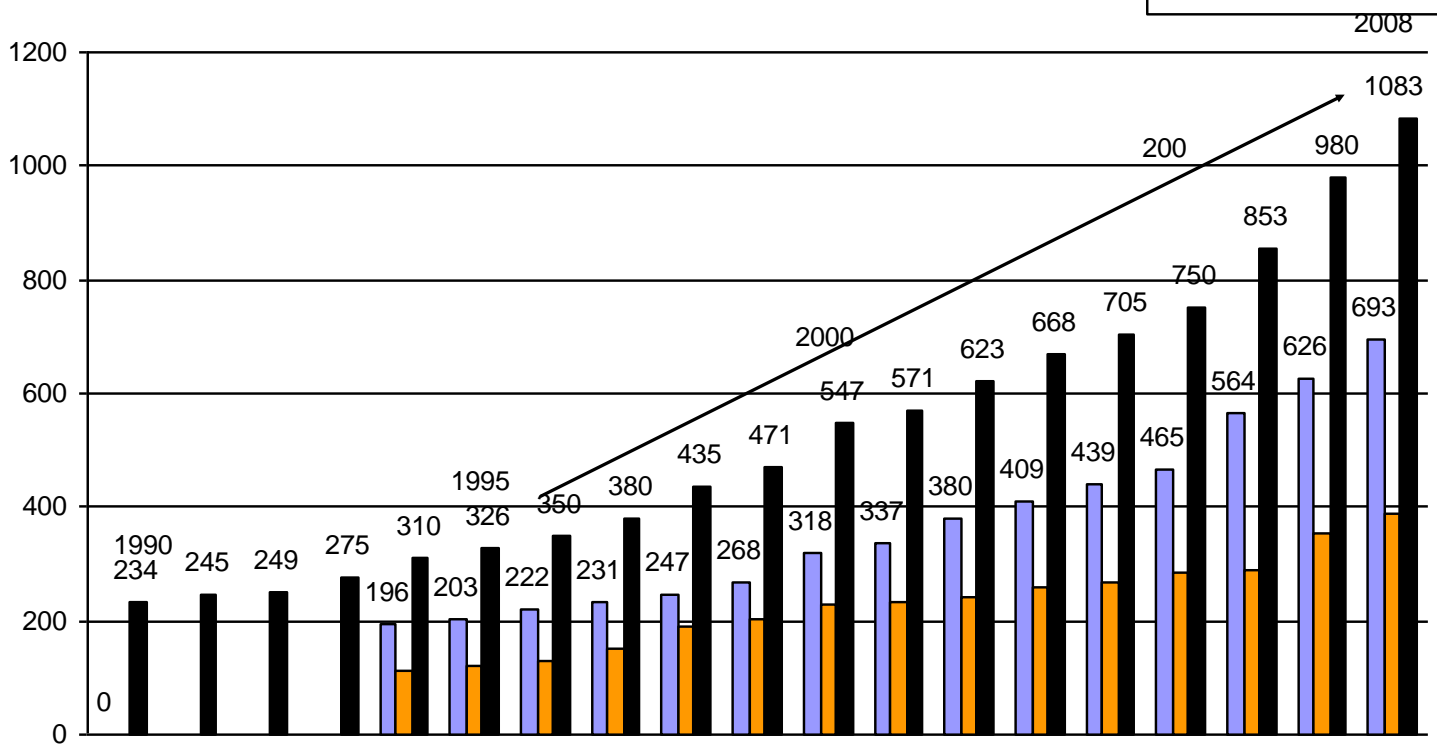
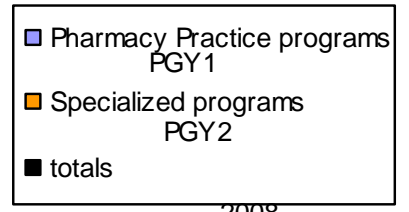
- Generally, licensure involves state authority, whereas certification is private. There are a few states that license specialists, but the more common approach seems to be for states to require that professionals who offer services as specialists either be board-certified or be able to show evidence of specialty training.

14. Does your profession have residency programs? If so, what has been the relationship between residency programs and specialization

- Are residencies accredited
- It appears that many or most are in human medicine, dentistry(?), and physical therapy. They are not accredited in veterinary medicine.
- Must accredited residency programs be a precondition for eventually taking a specialty certification exam?
- Yes in human medicine, although exceptions are made for foreign candidates. In the other professions, residency is one of several alternative means for meeting eligibility requirements to sit for a certification exam.

**APPENDIX C**  
**Residency Program Growth**

# Residency Programs in the Accreditation Process Growth Over Time 1990 - 2008



**APPENDIX D**  
**Professional Specialty Certification Models**

### Professional Specialty Certification Models

Organization	Number of specialties & subspecialties	Total number certified	Stakes*	Residencies	Impact on the Profession	Pros of the Model	Cons of the Model	Future
American Board of Medical Specialties (1933)	24 member boards spanning 145 specialties and subspecialties	Eighty-five percent of physicians are certified by at least one member board. 630,955 certified prior to 1998. 241,990 certified from 1998-2007. 77,316 subspecialty certifications in the same time period.	++++	Yes; accredited by the Accreditation Council for Graduate Medical Education	Generally positive; high impact on the profession	High level of consumer trust in certified physicians and third-party willingness to compensate certified physicians for authorized services.	Increasing tendency of consumers to bypass general practitioners and go directly to specialists, whether needed or not.	ABMS has recognized that newer sub-specialties cross specialty lines and has recently been offering multi-board joint certification in those sub-specialties.

Organization	Number of specialties & subspecialties	Total number certified	Stakes*	Residencies	Impact on the Profession	Pros of the Model	Cons of the Model	Future
American Board of Nursing Specialties (1991)	16 accredited certifying organizations spanning 50 certification programs	Approximately 500,000	++	Yes, but not accredited by a central authority	Generally negative; modest impact on the profession	High number of specialties are eligible for certification . . .	Confusion in the public mind about what various certifications signify and the lack of a central authority (ABNS not being the only authority) to coordinate either the specialty recognition or residency accreditation process	Movement within nursing to reconcile and refine the present patchwork of specialties and to present a unified system of specialization and credentialing.

Organization	Number of specialties & subspecialties	Total number certified	Stakes*	Residencies	Impact on the Profession	Pros of the Model	Cons of the Model	Future
American Board of Physical Therapy Specialties (1978)	7	7,573	++	Yes; accredited by the American Physical Therapy Association	Generally positive; increasing impact on the profession	Coordinated approach to recognizing and certifying specialties and residencies in physical therapy.	Physical therapists do not receive added compensation or payments from third party payers for being specialists	Direct consumer access to certified physical therapists in all environments for patient/client management, prevention and wellness services. Increasing grants of autonomous practice privileges to certified physical therapists.

<b>Organization</b>	<b>Number of specialties &amp; subspecialties</b>	<b>Total number certified</b>	<b>Stakes*</b>	<b>Residencies</b>	<b>Impact on the Profession</b>	<b>Pros of the Model</b>	<b>Cons of the Model</b>	<b>Future</b>
American Dental Association (1959)	9	16,482 (still active)	++++	Yes; accredited by the Council on Accreditation of the American Dental Association	Generally positive; high impact on the profession	Coordinated approach to recognizing and certifying specialties and residencies in dentistry.	Only a few specialties are recognized by third party payers. The participation in the other programs is dwindling.	Efforts to counter the shortage of faculty and residency program directors who are certified in a specialty.

Organization	Number of specialties & subspecialties	Total number certified	Stakes*	Residencies	Impact on the Profession	Pros of the Model	Cons of the Model	Future
Board of Pharmaceutical Specialties (1976)	5	6,715 as of 2007	+	Yes; accredited by the American Society of Health-System Pharmacists	Generally positive; modest impact on the profession	Recognition given to pharmacists who play a role in the healthcare system beyond that of product dispensers.	Lack of impact on compensation issues for advanced pharmacy practitioners .	More attention to the issue of direct patient care in the framework of specialty pharmacy certification

Organization	Number of specialties & subspecialties	Total number certified	Stakes*	Residencies	Impact on the Profession	Pros of the Model	Cons of the Model	Future
American Board of Veterinary Specialties	20 specialty organizations comprising 39 specialties	8,500+	+	Yes, but not accredited by a central authority	Generally positive; modest impact on the profession	Increased recognition of the value of advanced care offered by certified practitioners . . .	Disconnect between the academic nature of many of the recognized specialties and the work done by most veterinarians	Pet owners are increasingly demanding the same level of care for their pets as for themselves. Consequently, specialization and specialty certification will grow.

\* Low Stakes = +  
High Stakes = ++++