

Patient-Centered Care Services in the Community-Based Compounding Practice

Timothy B. McPherson¹ and Patrick E. Fontane²

¹SIUE School of Pharmacy, Edwardsville, IL

²St. Louis College of Pharmacy, St. Louis, MO

INTRODUCTION

USP defines pharmaceutical compounding as "...the preparation, mixing, assembling, packaging, and labeling of a drug or device in accordance with a licensed practitioner's prescription or medication order under an initiative based on the practitioner/patient/pharmacist/compounder relationship in the course of professional practice."¹

Previous research indicated that a frequent reason independent community pharmacists chose to offer compounding services was to "provide full pharmaceutical care" to patients.²

Yancey et. al found that independent community pharmacists who offered compounding services tended to collaborate closely with physicians and patients and to engage patients in follow-up interactions more frequently when dispensing a compounded medication than a manufactured product.³

Routine collaboration with physicians in therapeutic decision-making and proactive follow-up with patients are two hallmarks of patient-centered care (pharmaceutical care) as commonly described for hospital and clinic practice settings.^{4,6} These functions are uncommon in the prevalent volume-driven community pharmacy practice.⁷

The community pharmacists interviewed by Yancey thus appeared to develop a *hybrid clinical* practice, incorporating elements of both the typical community and institutional (clinical) functions within the context of their compounding practices.

The purpose of the study was to characterize the patient-centered care functions provided by community pharmacists with compounded medications.

METHODS

A cross-sectional survey of International Academy of Compounding Pharmacists (IACP) members was conducted. Since IACP is dedicated to issues that affect pharmaceutical compounding, their members were most likely to have the information we sought.

IACP members were invited to complete a 56-item internet based questionnaire. Reminders were sent at monthly intervals to increase participation. All contact was via email from the IACP office. No material incentive for participation was offered.

Questionnaire items probed:

- Descriptive information related to the pharmacist and the pharmacy
- Pharmacist-patient relationship attributes
- Pharmacist-physician relationship attributes
- Pharmacist perceptions of patient behaviors
- Compounding procedures

Data were analyzed using SPSS® software.

RESULTS

Response Rate

167 useable responses were received out of approximately 1,600 IACP members for a response rate of approximately 10%.

The results, therefore, cannot be considered representative of IACP membership. All comments herein refer to the respondents only.

Table 1. Respondents

Gender	Degrees Held	Years Practicing
Male 129 (78%)	B.S. 131 (78.4%)	Pharmacy 26.6 ± 11.7
Female 37 (22%)	Pharm.D. 23 (13.8%)	Compounding 14.5 ± 11.1
	Both 13 (7.8%)	

Table 2. Average Time Spent Counseling on New R_x

R _x	Mean (minutes)	Std. Dev	n
Manufactured product	4.6	6.3	129
Compounded medication	11.1	11.0	161

Figure 1. Frequency of Physician-Initiated Drug Therapy Recommendations in an Average Week

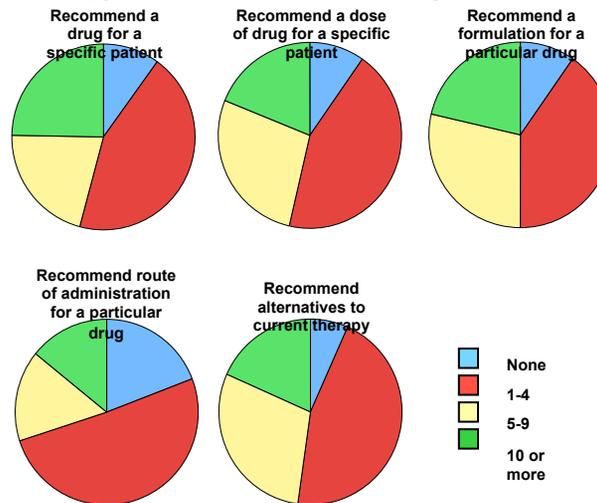


Table 3. Which Type of Product Are †You More Likely to Contact a Patient About Their Experience With?

Type	n
Manufactured Product	2 (1.6%)
Compounded Medication	97 (75.8%)
There is no difference	21 (16.4%)
I do not contact patients about their medications	8 (6.2%)

† Respondents who dispense both manufactured products and compounded medications.

Table 4. You Contact Physicians More Frequently About Compounded Medications Than Manufactured Products They Prescribe

Statement	n
Strongly agree	38 (29.9%)
Agree	53 (41.7%)
There is no difference	28 (22.0%)
Disagree	7 (5.6%)
Strongly disagree	1 (0.8%)

DISCUSSION

Respondents were not representative of IACP members or community pharmacists.

Consistent with Yancey³, respondents appeared to employ a hybrid-clinical practice in the context of compounding pharmacy. This practice appears to represent a different care paradigm than either traditional community or clinical practices.

Respondents who dispensed both manufactured and compounded medications preferentially provided enhanced care services with compounded medications.

The level of physician-initiated contact of respondent pharmacists to seek recommendations on drug therapy decisions appears to be extraordinary for the community setting. Schommer found that community pharmacists generally spent less time in "consultation" than they considered desirable.⁸

Proactively contacting patients about their experiences with a compounded medication also appears to be extraordinary for the community practice. Literature data for comparison with the typical compounding practice are lacking.

CONCLUSION

Respondents appear to demonstrate a practice paradigm in which significant patient-centered care services are provided with typical community practice in the context of compounding pharmacy.

Routine follow-up with patients and physicians and therapeutic collaboration with physicians distinguish this paradigm from the prevalent community practice.

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