



Original Research

Market dynamics of community pharmacies in Minnesota, U.S. from 1992 through 2012

Jon C. Schommer, Ph.D.^{a,*}, Akeem A. Yusuf, Ph.D.^b,
Ronald S. Hadsall, Ph.D.^a

^aUniversity of Minnesota, College of Pharmacy, 308 Harvard Street S.E., Minneapolis, MN 55455, USA

^bChronic Disease Research Group, Minneapolis Medical Research Foundation, 914 S 8th Street, Minneapolis, MN 55404, USA

Abstract

Background: An understanding of community pharmacy market dynamics is important for monitoring access points for pharmacist services.

Objectives: The purpose of this study was to describe (1) changes in pharmacy mix (independent versus chain) between 1992 and 2002 and between 2002 and 2012 for 87 counties in Minnesota (state in U.S.) and (2) the number (and proportion) of community pharmacies in Minnesota for the years 1992, 2002, and 2012 using a new categorization method developed specifically for this study.

Methods: Data included licensure records for 1992, 2002, and 2012 from the State of Minnesota Board of Pharmacy and county level demographics for 1990, 2000 and 2010 from the US Census Bureau. Descriptive statistics were used to summarize findings over time and to describe associations between study variables.

Results: The ratio of independent pharmacies to chain pharmacies changed from approximately 2:1 in 1992 to 1:2 in 2012. The primary market factors associated with changes in the number of community pharmacies per county were (1) the metropolitan designation of the county and (2) whether the population density (persons/square mile) was increasing or decreasing. The face of community pharmacy in Minnesota changed between 1992 and 2012. By 2012, pharmacies were located in traditional retail pharmacies, mass merchandiser outlets, supermarkets, and clinics/medical centers. Furthermore, specialty pharmacies grew in proportion to meet patient needs.

Conclusions: Between 1992 and 2012, the market dynamics of community pharmacies in Minnesota was characterized by vigorous market entry and exit. In light of recent health reform that is exhibiting characteristics such as continuity-of-care models, performance-based payment, technology advances, and the care of patients becoming more “ambulatory” (versus in-patient), we suggest that the market dynamics of community pharmacies will continue to exhibit vigorous market entry and exit in this new environment. It is proposed that the community pharmacy categories developed for this study will be useful for monitoring market dynamics in the future.

© 2014 Elsevier Inc. All rights reserved.

Keywords: Pharmacy; Market dynamics

* Corresponding author. Tel.: +1 612 626 9915; fax: +1 612 625 9931.

E-mail address: schom010@umn.edu (J.C. Schommer).

Introduction

An understanding of community pharmacy market dynamics is important for monitoring access points for pharmacist services such as medication dispensing, medication counseling, medication therapy management, and disease management.^{1–19} Schommer et al reported findings for market dynamics of community pharmacies in Minnesota between 1992 and 2002²⁰ and examined the impact of changes in some of the key environmental attributes across counties in Minnesota over that 10 year span on corresponding changes in community pharmacy mix (independent versus chain). Their main aim was to understand the entry, exit and stability of community pharmacies in Minnesota counties and understand how these differed between independent (10 or fewer pharmacies under common ownership) and chain pharmacies (greater than 10 pharmacies under common ownership).

Their applied environmental attributes research, rooted in organization behavior theory, for framing their study questions and results.^{20–23} This research posits that characteristics of the environment in which an organization conducts business, affect decisions about market entry and exit. In turn, such business decisions can influence the distribution of practitioners across regions.

Schommer et al²⁰ reported that every county in Minnesota had at least one community pharmacy in both 1992 and in 2002. Overall, the number of community pharmacies in Minnesota remained relatively constant (967 in 1992 and 996 in 2002). Between 1992 and 2002, the ratio of independent pharmacies (10 or fewer pharmacies under common ownership) to chain pharmacies (greater than 10 pharmacies under common ownership) changed from approximately 2:1 (637/330 = 1.9) to 1:1 (466/530 = 0.9).

Their findings also revealed that the primary market factors associated with changes in the number of community pharmacies overall per county were (1) the metropolitan designation of the county and (2) whether the population density (persons/square mile) was increasing or decreasing. First, counties with a metropolitan designation were more likely to gain pharmacies overall compared to counties without ($P < 0.001$). Second, counties with greater than five persons per square mile in population density increase were more likely to experience gains in community pharmacies overall ($P < 0.001$) as well as gains in the number of chain pharmacies ($P = 0.03$). A U-shaped pattern emerged for independent pharmacies in that counties with

a “negative change in population density” and counties with “greater than five persons per square mile increase in population density” lost relatively more independent pharmacies than the middle category did (counties with a zero to five persons per square mile change in population density).

These findings suggested that between 1992 and 2002, counties that had metropolitan infrastructures to provide a good base for logistics (e.g., roads, public transportation, communication hubs, health systems), markets for sale of other items in these pharmacies, and a strong source of community pharmacists for staffing the pharmacies, presented the best opportunities for growth in the number of pharmacies. Positive change in population density also was associated with gains in chain pharmacies suggesting that chain pharmacy decision-making for entry and expansion in a market is based on population characteristics within the market area. The results showed that some independent pharmacies may have closed due to chain competition in high population density growth areas. However, there also was evidence to suggest that population density decline was an important determinant of independent pharmacy closures. In such environments, chain pharmacies were not likely to open new pharmacies to replace the independent pharmacy.

That study²⁰ was conducted using data from 1992 to 2002. During the next decade (2002–2012), the Pharm.D. became the only degree acceptable for pharmacist licensure (2004), Medicare Part D was implemented (2006), the U.S. economy experienced a significant recession (2008), and health care reform was passed into law (2010). Our goal for the study reported in this article was to investigate market dynamics of community pharmacies in Minnesota using data from 2002 to 2012 using the same methods applied for the 1992–2002 data. In addition, we developed and applied a new categorization method for community pharmacies as a way to better describe and understand the market dynamics of community pharmacies in Minnesota. We developed the new categorization method based upon (1) business organization structure and (2) pharmacy type in order to describe community pharmacies that were emerging in response to recent health reform that is exhibiting characteristics such as continuity-of-care models, performance-based payment, technology advances, and the care of patients becoming more “ambulatory” (versus inpatient). This categorization method will be explained further in the [Methods](#) section.

Download English Version:

<https://daneshyari.com/en/article/2508719>

Download Persian Version:

<https://daneshyari.com/article/2508719>

[Daneshyari.com](https://daneshyari.com)