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## Could our patients be better served? A health literacy assessment of rural community pharmacies

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#### **Abstract**

Pharmacy staff and patient health literacy practices were assessed for pharmacies in a rural MO county with many residents at risk for low health literacy. Using AHRQ's Pharmacy Health Literacy Assessment Tool, overall weaknesses of county pharmacies determined as a result of the Assessment Tour section of the Tool included lack of interpretation services and poor print font size and clarity of leaflets. When a focus group was also conducted as part of the Tool, participants identified several barriers to service including reliance on their doctors, not their pharmacists, for medication information. The pharmacies in this sample were not as effective as they could be in meeting the needs of those with lower health literacy levels, and it is suggested that with some intentional changes, these pharmacies can better serve their patients with low health literacy.

### Could our patients be better served? A health literacy assessment of rural community pharmacies

#### Introduction

Health literacy, "the degree to which individuals have the capacity to obtain, process, and understand basic health information and services needed to make appropriate health decisions" (Kindig, Panzer, & Nielson-Bohlman, 2004, p. 21), is an important skill to acquire for individuals who use health services. For those with low health literacy skills and levels, the current health care system does not seem to meet their needs (Institute of Medicine, 2001; Jacobson et al., 2007). They are more likely to have chronic diseases like hypertension and diabetes, and they are also more likely to mismanage their diseases (Kindig, Panzer, & Nielson-Bohlman, 2004; US Department of Health and Human Services [USDHHS], 2010). A number of barriers contribute to patients' low health literacy levels; some of those barriers include limited English proficiency, low socioeconomic status, and limited education (Office of Disease Prevention and Health Promotion [ODPHP], 2005; Jacobson et al., 2007).

The rural Missouri county (which includes seven cities in 10 townships and a population of 25,000) in which this study was conducted has approximately 6,250 people that report 'poor' health status (MO Department of Health and Senior Services [MDHSS], 2014) including higher than state average prevalence rates of many chronic diseases. The prevalence rate for high cholesterol (46.8%) in this county is higher than that of the region and of the state (MDHSS, 2011) as nearly 90% of adults nationally may lack chronic disease management skills due to factors associated with low health literacy levels (Kindig, Panzer, & Nielson-Bohlman, 2004; Kutner, Greenberg, Jin, & Paulsen, 2006; Rudd, Oppenheimer, & Nath, 2007; USDHHS, 2010). Also, roughly 5% of county residents speak a language other than English, earn, per capita, approximately \$19,000/yr., or a median household income of approximately \$34,000/yr., (both below state averages), and only 59% possess at least a high school diploma (US Census Bureau, 2010). Any one of these factors may place them at risk for low health literacy. Because pharmacists can be used as a resource and are generally accessible to the public, their role in patient health and health literacy is vital. As noted by Youmans and Schillinger (2003), "pharmacists may be the first health care providers to recognize that a patient has inadequate

Undergraduate Research Journal for the Human Sciences, Vol. 15 [2016], Iss. 1, Art. 8 functional health literacy" (p. 1728). Therefore, pharmacists and pharmacy staff must be sensitive to patients' health literacy levels in order to meet their needs when attempting to fill their prescriptions or explain the effects of their prescribed medications. Those with the lowest health literacy levels are likely to have more prescriptions filled than those with higher levels, leading to higher health care costs (DeWalt, Berkman, Sheridan, Lohr & Pignone, 2004; Berkman, Sheridan, Donahue, Halpern & Crotty, 2011). Pharmacies and their staff serve as a key source of medication information for patients. In spite of this benefit, few pharmacies effectively serve patients with low health literacy levels (Shoemaker, Staub-DeLong, Wasserman, & Spranca, 2013).

Health literacy can be improved by a coordinated approach to increasing provider and patient knowledge, awareness, and skills (USDHHS, 2010), and a pharmacy health literacy assessment is an important first step for pharmacies that serve areas in which residents with lower health literacy levels reside (Rudd & Anderson, 2006; Jacobson et al., 2007). Specifically, an effective and successful pharmacy health literacy assessment measures how well those with lower health literacy are being served while also indicating any barriers that may prevent those with lower health literacy levels from obtaining and understanding health information and services (Jacobson et al., 2007).

For pharmacy providers (pharmacists, pharmacy technicians, interns, and other staff) in this county, to date, there have been no published articles on health literacy assessments, interventions, or trainings provided in the recent past. A pharmacy health literacy assessment is recommended, however, as a first step to identify areas for improvement prior to conducting a health literacy intervention. The purpose of this study, therefore, was to assess provider and patient health literacy practices and skills using the Agency for Healthcare Research and Quality's (AHRQ) Pharmacy Health Literacy Assessment Tool for a rural Missouri county served by five pharmacies.

#### **Methods**

#### Sample

#### Assessment Tour of the Pharmacy

All five pharmacies located within the county limits were selected to receive the Pharmacy Health Literacy Assessment Tour to assess the pharmacy physical environment and staff-patient communication: two chain pharmacies, one locally-owned pharmacy, one located inside of a grocery store, and one located inside of a hospital clinic. After Institutional Review Board (IRB) approval and prior to the tour, pharmacy managers were contacted and invited to participate in the study. A description of the tour, possible benefits/risks associated with the tour, and freedom to withdraw from the tour was explained to pharmacy managers. All but one of the pharmacy managers (due to corporate policies) consented and allowed the tour to be conducted.

#### Focus Group with Patients

After IRB approval and participant consent, four focus group participants, volunteer county residents recruited through the use of posted fliers and word-of-mouth, were given a consent form describing the purpose of the study and acknowledging their right to withdraw at any time. All signed the form and participated in the focus groups. Three-fourths of the participants were female, ages ranged from 18 to 75 years or older, and all identified as White, non-Hispanic. Two listed highest education received as high school diploma or GED, and two listed some college but without degree as highest education level achieved. Participants reported income ranging from under \$10,000 to between \$40,000-\$49,999 per year.

#### Instruments

Jones: Could our patients be better served? A Health literacy assessment Created by the Agency for Healthcare Research and Quality to improve pharmacy health literacy practices, the first and third sections of the Pharmacy Health Literacy Assessment Tool (Agency for Healthcare Research and Quality, 2014) were used to audit the pharmacy environment and to elicit the perceptions of pharmacy patients about opportunities for service improvement. Designed for large urban pharmacies, the tool can also be used in other pharmacy environments.

#### Part I: Pharmacy Health Literacy Assessment Tour Guide

The Pharmacy Health Literacy Assessment Tour Guide consists of 19 questions in three sections (Promotion of Services – user-friendly environment, Print Materials – accessibility of written materials, and Clear Verbal Communication – communication between staff/patients) as well as a comments section to be completed by trained auditors as thoroughly as possible. For each question, the auditor rates either: 1 – pharmacy does not appear to be doing this, 2 – pharmacy is doing this but could be improved, 3 – pharmacy is doing this well, 4 – not applicable, or 5 – blank/cannot assess. Comment boxes at the end of each section are used for additional observations.

#### Part III: Guide for Focus Groups with Patients

The Pharmacy Patient Focus Group section of the Pharmacy Health Literacy Assessment measures perceptions of focus group patients about any barriers to understanding and use of pharmacy services. The one-page anonymous demographic survey is to be administered to the participants at the beginning of the focus group. The Health Literacy Assessment Facilitator's Guide for Patient Focus Groups is followed to assess barriers to service in specific categories (Physical Environment, Care Process and Workforce, Paperwork and Written Communication, and Culture).

#### **Procedure**

#### Pharmacy Health Literacy Assessment Tour Guide

Each pharmacy manager was contacted one month prior to the tour to obtain leadership commitment to the process. Also one month prior, the researcher recruited (through the use of fliers) a co-auditor to ensure inter-rater reliability. The researcher, as auditor, and the co-auditor were then trained together in the use of the Pharmacy Health Literacy Assessment Tour Guide by a professor of health science with expertise in health literacy assessment and education. Both auditors possessed health science background and understood health communication, were not employees of any pharmacy, and could blend in with pharmacy customers. Over two hours in one day, the trainer reviewed the Tour Guide instructions and role-played strategies with the auditors to ensure that appropriate responses, important observations, and item-specific instructions were clear.

Over the next two months, each auditor independently visited the participating pharmacies during a very busy time in the pharmacy as well as during a less busy time; one weekday and one weekend. Each Pharmacy Health Literacy Assessment Tour took about one-half hour to complete. Using the 19-question Pharmacy Health Literacy Assessment Tour Guide, auditors rated each pharmacy on: Promotion of Services, Print Materials, and Clear Verbal Communication following the Instructions for Completing the Pharmacy Assessment Tour Guide (Agency for Healthcare Research and Quality, 2014).

#### Focus Group with Patients

After IRB approval and one month prior to conducting the group, a focus group note-taker was recruited by the researcher and trained by a professor of health science to take written notes and use a digital audio-recording device during the focus group. The researcher was then trained as a focus group facilitator by a professor of health science with expertise in conducting

Undergraduate Research Journal for the Human Sciences, Vol. 15 [2016], Iss. 1, Art. 8 community health focus groups, and the training focused on following instructions in AHRQ's Guide for Focus Groups with Patients (Agency for Healthcare Research and Quality, 2014). Focus group participants were recruited through the use of fliers placed in high-visibility areas within the county. Because the average American adult reads at the 8th grade level (Chen, Noureldin, & Plake, 2013), the fliers were written at the 7th grade level or below to account for low health literacy levels. Focus group participation was incentivized through eligibility as part of a drawing for two small tablet computers. Eligible participants were to be over 18 years of age, long-time patients of a pharmacy who pick-up their own medications, and who need no assistance in taking their medications.

Two focus groups were scheduled for two hours each at the local university for the four participants (two attendees each session) who responded to the flier advertisements. When participants first entered, they received an informed consent document acknowledging they freely agreed to participate in the study as well as a consent form allowing them to be audiotaped. Next, winners were drawn for the incentive prizes. The forms, in hard copy and also read aloud to participants, explained the purpose of the focus group interview, possible benefits and harm from participation, that they were free to withdraw at any time, how the results will be used, and an agreement to be audio-taped. After completion of the consent form, an anonymous demographic survey was then given in hard copy and also read aloud to participants as they followed along and answered each question. Following the anonymous demographic survey, the facilitator conducted the group using the Guide for Focus Groups with Patients interview guide questions, a note taker, and a mini audio recorder to record the discussion. The Facilitator's Guide for Patient Focus Groups was followed as the facilitator lead participants through a discussion of each section. In the Paperwork section, the facilitator used sample prescription bottle labels and informational leaflets as participants attempted to comprehend written medicine instructions.

#### Analysis

#### Pharmacy Health Literacy Assessment Tour Guide

Descriptive statistics were used for the Pharmacy Health Literacy Assessment Tour results. A variable was created for each item or sub-item. For items 1-18b, response options: 1-Does not appear to be doing, 2-Doing but could be improved, 3-Doing well, 7-Not applicable or no box checked (not included in calculations). For items 19a-d, response options: 0-No or 1-Yes. Data gathered from pharmacy assessments were compiled from each auditor and mean scores were calculated. For all items, a higher mean score suggests the pharmacy is doing a better job on those items.

Each pharmacy's mean score for items 1-19d of the Tour Guide, as well as an interpretation of the scores, were determined based on an interpretation table provided with the tool (Agency for Healthcare Research and Quality, 2014). Overall strengths and weaknesses of pharmacies in the county were determined by assessing the grand mean score of all the pharmacies for a given item. Total grand mean scores of (>2.5) were considered strengths, and total grand mean scores of (<1.5) were considered weaknesses for items 1-18b. For items 19a-d, total grand mean scores (=1) were considered strengths, total grand mean scores of (=0) were considered weaknesses, and any total grand mean scores between 0 and 1 were considered inconsistent and were excluded.

#### Focus Group with Patients

Audiotapes were transcribed by the researcher who listened to recordings several times to ensure the accuracy of the transcription. Written notes taken by the note taker and transcripts were compiled and summarized. Using the Krueger method of interpreting and categorizing focus group data, the researcher considered the words that were used, the context in which they were used, the frequency and extensiveness of comments, the intensity of comments,

Jones: Could our patients be better served? A Health literacy assessment internal consistency, specificity of responses, and big ideas in order to create main themes from the qualitative data (Krueger, 1994). Descriptive statistics were used to summarize the anonymous demographic survey (age, sex, race/ethnicity, education level, annual income) results.

#### **Results**

#### Assessment Tour of the Pharmacy

Following Pharmacy Health Literacy Assessment Tour guidelines, strengths and weaknesses in the environment and in staff-patient communications observed by auditors were to be reported. For overall results, the following strengths and weaknesses reported are only those for which there were three or more mean scores determinable.

For section one, Promotion of Services- user-friendly physical environment- (Table 1), the most notable strengths included: Pharmacy's name and symbol clearly displayed (M=3.0), Phone number easily found on materials (M=2.9), and Verbal directions include references to familiar landmarks (M=2.8). Weaknesses were: Easy to access brochures in displays (M=1.3), and Variety of ways to inform customers about services (M=1.3).

For section two, Print Materials- accessibility of labels, inserts, brochures and posters- (Table 2), the most notable strengths in the sub-section Simple and Clear Language was Avoiding technical jargon on posters and signs (M=3.0), bottle labels (M=2.8), and warning labels (M=2.6). The most notable strength in the sub-section Print Size was Font size of 12 pt. or higher on posters and signs (M=3.0), however, the weakness was Print size on leaflets (M=1.0). For the sub-section Easy to Understand, the strength was Easy to understand posters and signs (M=2.9), and the weakness was Clear leaflets (M=1.0).

For section three, Clear Verbal Communication- pharmacy staff and patient communication- (Table 3), the strength was Staff communicate without using medical jargon (M=3.0), however, a notable weakness included Provision of interpreters for patients with limited English skills (M=1.3).

#### Focus Group with Patients

Focus group participant demographics were summarized in Table 4. Focus group participant demographics generally resembled county demographic profiles. Three major themes were expressed by focus group participants as they discussed pharmacy physical environment, care process and workforce, paperwork and written communication, and culture.

The first theme was titled Friendliness and Helpfulness. This theme was characterized by the participants' perception of "friendliness" that staff displayed at the pharmacies they frequented within the county. In general, participants found staff friendly, and they would receive assistance whenever they asked.

#### Friendliness and Helpfulness

I: How friendly or unfriendly are the pharmacy staff members?

\*: At [X] they're always really nice, I've never felt like anyone was rude or unfriendly or anything.

*I:* How are patients treated?

\*: Yea, I'd say pretty well. I mean, they're always really friendly, [X's] like my favorite because they're always usually really friendly and helpful people.

- Undergraduate Research Journal for the Human Sciences, Vol. 15 [2016], Iss. 1, Art. 8 \*: They usually have a smiling face and they don't speak in a bad tone or anything.
- I: If you need help with something, do you feel comfortable asking a staff person?
- \*: They're all willing to help and do something
- I: Many patients have medical problems, they may have a hard time hearing or seeing. If you have any of those problems, do pharmacists adapt to your needs?
- \*: Yea,... I've actually asked one time before, it was a glitch in one of the things I had to sign and [it was] one of my first times and I was like "um, what does this say" and they were like "oh, well...", so, I think that they're really helpful.

#### **Doctor Knows Best**

The second theme was titled Doctor Knows Best. This theme was characterized by the participants' distinction between what they expected of their pharmacists and what they expected from their doctor. Most participants believed, in some instances, a doctor would be a better source of medication information. It seemed participants would rather ask their doctor than the pharmacist about their medications, and many felt their pharmacist never told them anything about their medications.

- *I:* When you pick up your prescription, has a pharmacist ever told you what the medicine does?
- \*: No. That there, I'd leave to the doctor.
- I: When you pick up your prescription, has a pharmacist ever told you what the medicine is or what it does?
- \*: Whenever I get new prescriptions, like an antibiotic or something, they never tell me that it's an antibiotic, they'll just be like, "okay you got this". But the two that I get on a monthly basis it doesn't really matter because I get them all the time so I'm glad that you don't tell me what it's for, one that's kind of personal and I don't, that's my doctor's job.
- *I:* If not, do you think there should be a space (to talk to a staff person in private)? Would you use it?
- \*: I don't feel like I would ever use one because I had a question that I would feel like I'd want privacy, I'd go ask my doctor. [But,] I think that they should have a space for that reason if people want.
- I: What do you usually need to know when you are trying to find information on printed materials?
- \*: I never read anything because I feel like my doctor will tell me what I need to know. Like, "it'll cause this main side effect" or "take it..." however, so I've just trusted my doctor.

#### **Too Small and Unreadable**

Jones: Could our patients be better served? A Health literacy assessment The third theme was called Too Small and Unreadable. This theme was characterized by participants' mostly negative reactions to pharmacy sample materials, such as prescription bottles and information leaflets. All the participants agreed that print size on the information leaflets was too small, and one admitted that they never read the information leaflets because of the small print. Most believed the words were too tiny and lacked pictures.

- *I:* Please tell me how easy or hard the following items are for you to read and understand prescription information inserts.
- \*: I can't read that little print.
- \*: If I hadn't had my eyes worked on, I couldn't even read the paper.
- *I:* Please tell me how easy or hard the following items are for you to read and understand prescription information inserts.
- \*: I've never ever read one printed thing they put on the bag.
- *I:* Please tell me how easy or hard the following items are for you to read and understand prescription information inserts.
- \*: These have sub-headings which is good but it's so small that like...
- \*: It doesn't matter...
- I: Are the printed materials organized in a way that makes it easy for you to find the information you need?
- \*: The information, no. I just look at all the words and how tiny it is and I'm like, no.

#### **Discussion/Conclusion**

Pharmacy staff and patient health literacy practices and skills were assessed for four pharmacies in a rural MO county using AHRQ's Pharmacy Health Literacy Assessment Tool. Pharmacy health literacy assessments such as this one measure how well those with low health literacy are served as well as indicate any barriers to that population obtaining pharmacy services (Jacobson et al, 2007). In this study, overall strengths of county pharmacies determined as a result of the Pharmacy Health Literacy Assessment Tour section of the Tool included: clear signage at pharmacy entrances, simple language and appropriate print font size on posters and signs, and staff communication to patients without using medical jargon. On the other hand, overall weaknesses of county pharmacies included: variety of ways to inform customers about services, easy access to brochures in displays, provision of interpreters for those with limited English, as well as print font size and clarity of leaflets. When a focus group was also conducted as part of the Tool, patient focus group participants identified several barriers to service including: pharmacists do not educate them about their medications except when asked, participants relied on their doctors, not their pharmacists, for medication information, and that font size on some print materials was too small and unreadable.

Pharmacies in this sample were in an area of Missouri that possessed many residents with low incomes and low education levels, placing them at risk for low health literacy (ODPHP, 2005; Jacobson et al., 2007). The health care system and, specifically, most pharmacies have a difficult time meeting the needs of those with low health literacy (Institute of Medicine, 2001; Jacobson et al., 2007; Shoemaker, Staub-DeLong, Wasserman, & Spranca, 2013). Consistent with the literature, the pharmacies in this sample, too, are not as effective as they could be in

Undergraduate Research Journal for the Human Sciences, Vol. 15 [2016], Iss. 1, Art. 8 meeting those needs. Overall, pharmacy staff in this sample needed to be more aware of patients' health literacy levels and more effectively communicate with them in order to help decrease health problems and health care costs (DeWalt, Berkman, Sheridan, Lohr & Pignone, 2004; Berkman, Sheridan, Donahue, Halpern & Crotty, 2011).

For the Pharmacy Health Literacy Assessment Tour, it is interesting to speculate on reasons for overall weaknesses in a couple areas. Possibly because the leaflets had to have so much medical information on them, they had to fit on a convenient size of paper to be stapled to the prescription bag. Unfortunately, small font size and lack of clarity of leaflets that were attached to the prescription bag were reported by participants as never being read. It is recommended that some text be replaced with graphics and an option for large-print versions be made available. In addition, the pharmacist could verbally reinforce the most important medical facts from the leaflet as the patient signs for their prescription. Also, maybe due to high cost and current low levels of non-English speakers in the county, interpretation services were not generally provided. Although only 5% of the county's current population possessed limited English skills, in the future, immigration numbers may increase; prompting possible change in this practice. In the future, it is recommended that the pharmacies hire bi-lingual staff or subscribe to call-in interpretation services, a less expensive option.

For focus group findings, although perceived as friendly, pharmacy staff did not educate participants about their medications unless asked. Maybe most participants were long-term users of a specific medication and did not require medication counseling. Even so, the pharmacists should still regularly follow-up to check for long-term side effects or inquire about drug interactions with any new medications recently prescribed. It is also recommended that pharmacy staff be trained to ask patients, even long-term customers, each time they visit, if they would like to speak with the pharmacist about any questions they may have or any side effects they may be experiencing. By interacting with patients in this fashion, pharmacists can be the first line of assessment in determining patient health literacy level (Youmans & Schillinger, 2003).

In addition, participants expected to receive information about their medications from their doctors, not their pharmacists. It seems participants did not understand that pharmacists can do more than just fill prescriptions. Pharmacists can give advice on medication interactions, medication side effects, and general disease prevention. Although pharmacists have more expertise in these areas, participants seemed to not use those services and trusted their doctors to dispense this information. More advertising and promotion about these services should be conducted to educate patients about the role and responsibilities of pharmacists and pharmacies in the healthcare setting. Lastly, similar to the Pharmacy Health Literacy Assessment results, important information about medications that went home with the patient via leaflets lacked pictures, and the font size was generally unreadable for most participants. Again staff should be trained to provide verbal reinforcement about important medication facts each time a patient picks up their prescription.

As a community-based participatory research study, results are not generalizable. The current study, though, has provided information to suggest that with some intentional changes, it may be possible to better serve those with lower health literacy levels in these pharmacies. A pharmacy health literacy assessment like the one conducted in this study is recommended prior to conducting a health literacy intervention to improve upon identified weaknesses (Rudd & Anderson, 2006; Jacobson et al., 2007). Individual Pharmacy Health Literacy Assessment Tour results as well as focus group results and recommendations will be shared with participating pharmacy managers to assist them in targeting their future interventions. Future research could also add another part of the Tool – the Pharmacy Staff Survey – to assess staff sensitivity to the needs of low health literate patients and identify any incongruence with results of the two other assessments.

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**Table 1**Health Literacy Assessment Tour (HLA Tour) – Promotion of Services (N=4)

HLA Variable	Grand Mean	Interpretation
When staff give verbal or written directions for finding the pharmacy, they refer to familiar landmarks and bus stops	2.8	Could make improvements
Pharmacy logo illustrates the service that the pharmacy provides in the community (e.g., graphic depiction of dispensing medication)	2.4	Could make improvements
The phone number is easy for everyone to find on all promotional or informational materials	2.9	Could make improvements
The pharmacy's name and symbol are clearly displayed at the entrance to the pharmacy	3	Doing well
Clear signs and symbols direct people from the building entrance to the pharmacy.	2.2	Could make improvements

 Table 2

 Health Literacy Assessment Tour (HLA Tour) - Print Materials (N=4)

HLA Variable	Grand Mean	Interpretation
The pharmacy uses printed materials to advise patients about its services in different parts of the hospital or clinic	1	Does not appear to be occurring
Emergency room waiting area	1	Does not appear to be occurring
Primary care areas	1	Does not appear to be occurring
Information booth in lobby	1	Does not appear to be occurring
The following print materials are written in simple and clear language technical jargon and medical terms:	je, avoid	ing the use of
Prescription information leaflets that the pharmacist prints out	1.9	Does not appear to be occurring
Patient education brochures that the patient takes home	3	Doing well
Informational posters and signs on the pharmacy walls	3	Doing well
Bottle labels	2.8	Could make improvements
Warning labels	2.7	Could make improvements

Jones: Could our patients be better served? A Health literacy assessment The following print materials are designed with lots of clear space to provide relief from the print: Prescription information leaflets that the pharmacist prints out 1.7 Does not appear to be occurring Patient education brochures that the patient takes home 3 Doing well Informational posters and signs on the pharmacy walls 2.2 Could make improvements The pharmacy uses visual graphics or illustrations in the following print materials (graphics should be simple and convey the meaning of the text in a way that decreases dependency on the text for comprehension): Prescription information leaflets that the pharmacist prints out 1 Does not appear to be occurring 2 Patient education brochures that the patient takes home Could make improvements Informational posters and signs on the pharmacy walls 1.9 Does not appear to be occurring If appropriate, these print materials are available in languages other than English: Prescription information leaflets that the pharmacist prints out 1.75 Does not appear to be occurring 3 Patient education brochures that the patient takes home Doing well Informational posters and signs on the pharmacy walls 1 Does not appear to be occurring The pharmacy uses a print size of 12 pt. or higher in the following print materials (other observations about print—use of bold, italics, etc.—may be recorded in the "comments" box at the end of the section): Prescription information leaflets that the pharmacist prints out Does not appear 1 to be occurring Patient education brochures that the patient takes home 3 Doing well Informational posters and signs on the pharmacy walls 3 Doing well Overall, these print materials are easy for adults with limited literacy skills to understand: Prescription information leaflets that the pharmacist prints out 1 Does not appear to be occurring Patient education brochures that the patient takes home 2 Could make improvements 2.9 Informational posters and signs on the pharmacy walls Could make improvements

#### Table 3

Health Literacy Assessment Tour (HLA Tour) - Clear Verbal Communication (N=4)

HLA Variable	Grand Mean	Interpretation
Pharmacy staff avoid using medical jargon when they communicate verbally with patients (e.g., words and phrases like "anticoagulant," "oral hypoglycemic," "hypertension," "npo," "OTC," or "prn")	3	Doing well

Undergraduate Research Journal for the Human Sciences, Vol. 15 [2016], Iss. 1, Art. 8 The pharmacy offers and provides interpreters to patients for whom English is a second language: In person 1.3 Does not appear to be occurring 1 On the telephone Does not appear to be occurring The pharmacy has the following: A window between pharmacy staff and the patient 0 Auditors agree "No" A raised platform between pharmacy staff and the patient .6 Inconsistency among auditors 0 Information sheets to inform patients on disease states and drugs to Auditors agree help them understand their condition and treatment "No" A call-in telephone line for patients to ask questions .9 Inconsistency among auditors

## Table 4 Demographics of Focus Group Participants (n = 4)

Demographic Variable	Frequency (n)	Percentage (%)
Sex		
Male	1	25.00%
Female	3	75.00%
Total	4	
Age 18-24	2	50.00%
75 years or older	2	50.00%
Total	4	
Ethnicity		
White, non-Hispanic	4	100.00%
Total	4	
Highest level of school completed		
High school graduate, diploma or GED	2	50.00%
Some college , no degree	2	50.00%
Total	4	
Total household income in U.S. dollars		
Under \$10,000	2	50.00%
\$40,000-49,999	2	50.00%
Total	4	



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