A MIXED METHODS APPROACH TO EXPLORING BARRIERS TO MAMMOGRAPHY COMPLETION.

Jasmine Rangoola  
*East Stroudsburg University of Pennsylvania*

Grant M. Greenberg M.D., M.H.S.A., M.A.  
*Lehigh Valley Health Network, grant.greenberg@lvhn.org*

Melanie B. Johnson MPA  
*Lehigh Valley Health Network, Melanie_B.Johnson@lvhn.org*

Kyle Shaak BS  
*Lehigh Valley Health Network, Kyle.Shaak@lvhn.org*

Follow this and additional works at: [http://scholarlyworks.lvhn.org/research-scholars-posters](http://scholarlyworks.lvhn.org/research-scholars-posters)

Published In/Presented At  

This Poster is brought to you for free and open access by LVHN Scholarly Works. It has been accepted for inclusion in LVHN Scholarly Works by an authorized administrator. For more information, please contact LibraryServices@lvhn.org.
A MIXED METHODS APPROACH TO EXPLORING BARRIERS TO MAMMOGRAPHY COMPLETION

Jasmine Rangooli, MPH Candidate, Grant Greenberg, MD, MHSA, MA, Melanie Johnson, MPA & Kyle Shaak, MPH
Lehigh Valley Health Network, Allentown, Pennsylvania

BACKGROUND / INTRODUCTION

• Breast cancer (BC) is one of the most common cancer among women in United States (1).
• Mammograms are the best way to find breast cancer early (2).
• Department of Family Medicine at Lehigh Valley Health Network (LVHN) has a mammography rate of 67%.
• Healthy People 2020 has a target of 81.1% for women aged 50-74 years who had a mammogram in the past 2 years (3).
• The purpose of the study was to identify individual and systemic barriers for mammography screening and propose measures or interventions for addressing those barriers.

METHODS

• Four Lehigh Valley Physician Group (LVPG) Family Medicine Practices and 1 Breast Health Services (BHS) Location were identified for the Mixed Methods approach, including patient sampling, staff interviews and workflow mapping.
• Informal patient interviews were conducted with women meeting criteria: aged 50-74, active patient at one of the 4 identified practices, English-speaking, with no documented breast cancer screening in the last 24 months.

RESULTS

Patient Participant Demographics:
Medicare (41.7%), Private insurance (50%) & Medicaid (8.3%)
Not Hispanic (83.3%), Hispanic (12.5%) & Unknown (4.2%)
Average Age of Participants: 61.1 years

Perceived Barriers for Mammography

<table>
<thead>
<tr>
<th>Cues to Action</th>
<th>Perceived Susceptibility</th>
<th>Perceived Severity</th>
<th>Perceived Benefits</th>
<th>Perceived Efficacy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Friends/ Relatives advise: 54.2%</td>
<td>Only 25% said that they were at risk of developing BC</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Physician Recommendation: 45.8%</td>
<td>70.8% considered BC as serious</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reminders: 45.8%</td>
<td>62.5% said mammography screening has some benefits</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Talking to someone who has had one: 37.5%</td>
<td>66.7% were very likely/likely to go for mammography in future</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Web-Portal Scheduling: 33.3%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Advertisement: 25%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>If there is a concern: 16.7%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Family History of Cancer: 4.2%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proper follow up after screening: 4.2%</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Patient Interviews Data: HEALTH BELIEF MODEL

Based on Health Belief Model (4)
260 patients were called, 24 completed interviews
Conducted at 4 Practices and 1 Breast Health Services (BHS) site

RECOMMENDATIONS

• Implementation of Caller ID displaying hospital name.
• Educate patients on importance & value of screening, & risk for BC.
• Educate patients & staff on near universal coverage for mammography screening.
• Add information on mammography locations in EPIC After Visit Summary or provide a map of locations & hours of the BHS sites.
• Streamlining processes for self-referral & overdue patients.
• Assessment of screening rates through web-portal scheduling, once active.
• Determine and disseminate Breast Health Imaging Guide & standard guidelines.
• Improve capturing of internal & external data for mammograms in EPIC to avoid measurement errors.
• Convenience scheduling pilot (in office scheduling)
• Compare and learn from processes of colon cancer screening at LVHN.
• Further research on need for resources, marketing, availability of hours and preference of timings by the patients is required.