Improving Eye Care in Diabetic Patients in Vermont

Ashfi Chowdhury
Richmond Family Medicine

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Dr. Hannah Rabin

University of Vermont | Larner College of Medicine

Problem Identification

- Diabetic retinopathy is the **leading cause of blindness** in working age adults worldwide (National Eye Institute)
- Up to **90% of vision loss** from diabetes can be prevented with early detection and timely treatment (American Diabetes Association)
- In Vermont, approximately 8.5% of adults have diabetes, with many at risk for developing eye complications due to lack of regular eye exams (Vermont Dept of Health)
- Less than 60% of diabetic patients receive annual eye exams (Centers for Disease Control and Prevention)
- **Focus Area : Focus on improving education and care coordination to ensure diabetic patients understand the importance of annual eye exams**
- **Develop educational materials tailored to health literacy and needs of VT diabetic population**

Public Health Cost

- National costs: Diabetic retinopathy costs the US healthcare system an estimated **$500 million annually** in direct medical expenses (National Eye Institute)
- Vision Loss Impact: Vision loss in diabetic patients can lead to reduced quality of life, loss of productivity, and increased dependency on social services (CDC)
- Vermont Costs: Managing diabetes and its complications, including vision loss, costs Vermont millions of dollars annually in healthcare expenses (VT Dept of Health)
- Unique Consideration in Chittenden County
    - Limited access to specialized eye care in rural areas can delay diagnosis and treatment
    - Socioeconomic factors, such as insurance coverage and transportation, may hinder regular eye care visits for diabetic patients.
    - Health literacy challenges can prevent patients from understanding the importance of routine diabetic eye exams

Community Perspective and Support

Local Optometrist OD – Burlington, VT

•Annual well visit eye exams with dilation is critical. Vision exams are different from eye exams. There's very little PCPs can do to determine concerns so "talking to their patients is the **critical part**".

•Lack of resources means ophthalmology visits are often reserved for critical cases. Optometrists are the "primary care eye doctors" and play a crucial role in screening patients.

Hannah Kasper Diabetic Educator UVM Endocrinology and Diabetic patient

•A diabetic herself, Hannah shared her confusion regarding where to receive eye care and which provider – optometrist or ophthalmologist. It's important to emphasize that optometrists perform dilated eye exams and refer to ophthalmologists for acute care.

•There seems to be confusion between the terminology of "**dilated eye exam**" and "diabetic eye exam". Clarity on what tests are needed, where to get them, and associated costs would be helpful. Patients might understand diabetes can damage their eyes – the logistics of accessing care can be complex.

Both the optometrist and Hannah emphasize the importance of enhancing patient education regarding diabetic eye care!

Intervention and Methodology

Intervention

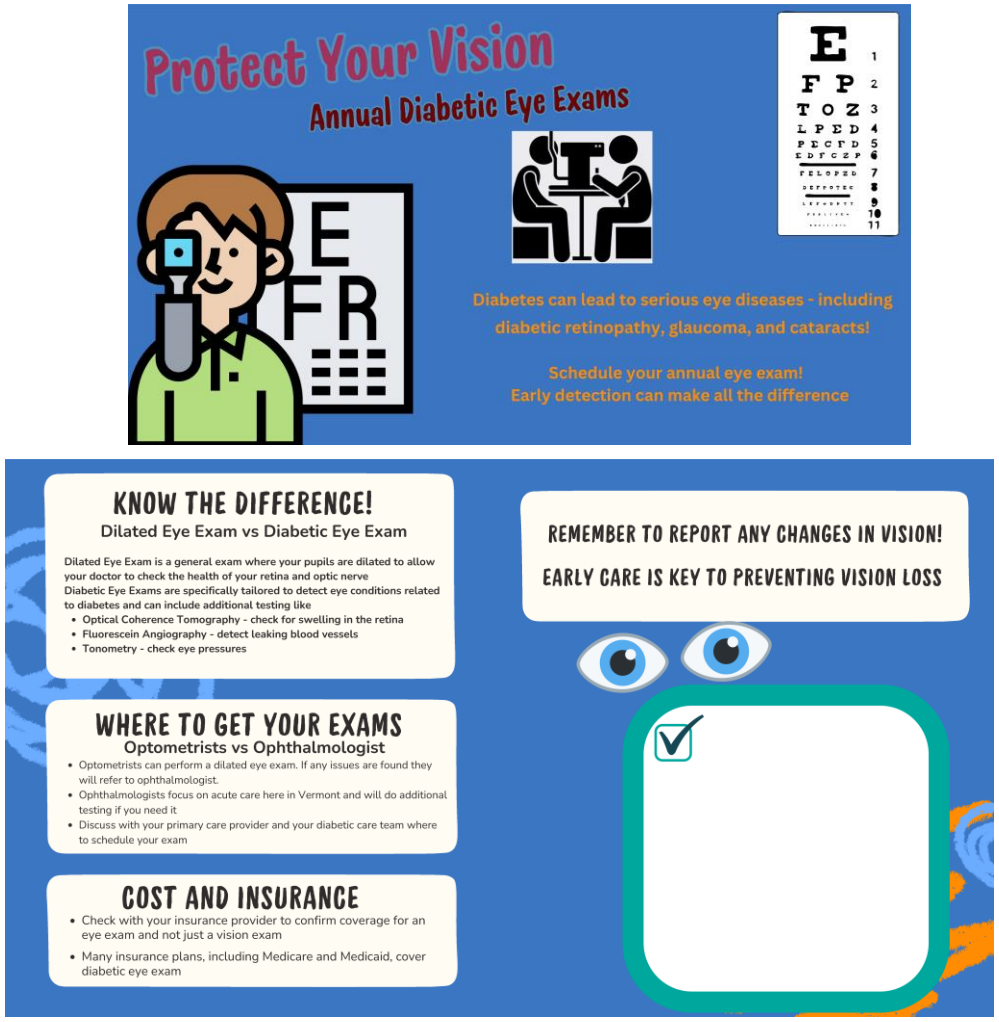
- **Creation and distribution of an informational postcard** to help educate diabetic patients about the importance of annual eye exams and the types of exams available.
- Key point: Patients need guidance on understanding the differences between a dilated eye exam and a diabetic eye exam, as well as where to seek care
- Target: diabetic patients in primary care clinics and community health centers in Chittenden County

Methodology

- Visually appealing, easy to read postcard that will use **clear language and visuals** to convey key messages.
- Distribution –
  - Postcards will be available in waiting rooms of primary care clinics
  - A space is available to mail out the cards to patients
  - An electronic version can be shared through patient portals for broader reach

Results and Response Data

- Primary care providers commented that these can effectively clarify the importance of regular eye exams for those with diabetes
- Patients will be more informed and encouraged to schedule their exams. The conversation will start with their providers.
- Due to time constraints, postcards were unable to be distributed



Example of the educational postcard designed for diabetic patients

Proposed Evaluation Methods

Surveys

Conduct surveys among patients after distributing postcards to assess their understanding of the importance of annual eye exams and note any behavioral changes regarding scheduling eye exams

Get qualitative feedback from healthcare providers on the impact of these postcards on patient discussion about eye care.

Metrics for Success

Compare the percentage of patients scheduling eye exams before and after distribution of the cards.

Evaluate the level of awareness about diabetic eye diseases and types of exams

Limitations

The effectives of the intervention may be limited by the duration of distribution and the feedback collection period.

The number of participants may be constrained by the willingness of patients to engage and clinic participation

Recommendations for the Future

1. Expand Educational Materials - Develop additional materials focused on educating patients about diabetic eye diseases
2. Community Engagement – Host workshops or informational sessions to educate patients and their families
3. Collaborate with local optometrists – create joint outreach initiatives where optometrist can answer questions and provide direct referrals for diabetic eye exams
4. Digital outreach – utilize social media and clinic websites to share information about eye care.
5. Follow up Initiatives – implement follow up reminders (text/email) to encourage patients to schedule their eye exams
6. Analyzing the data – gather patient feedback on educational materials and interventions to adapt based on their comments and needs

References

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