Depression Screening in Clinic Patients with a Cancer Diagnosis following Standardization of Intake Screening

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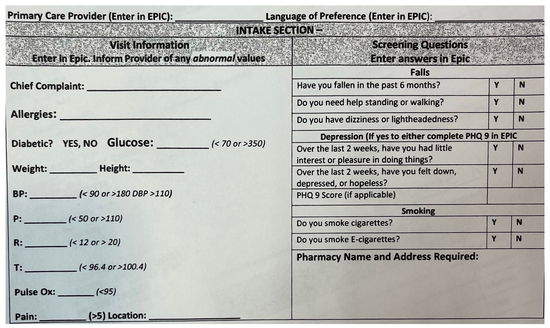
Background

- There is an estimated increased prevalence of Major Depressive Disorder (11%) amongst patients with cancer, with an estimated prevalence of only 5-6% in the general population.
- The 2022 NCCN guidelines recommend distress screening, including emotional assessment, ideally at each visit for patients with a diagnosis or history of cancer.
- Our previous randomized retrospective analysis of 100 encounters in patients with a cancer diagnosis found that a PHQ-2 was administered and documented in only 53% of encounters.
- In January 2021, a standardized nursing intake form including a PHQ-2 screen was introduced in both the Academic Internal Medicine (AIMC) and Medicine-Pediatrics (UPED) clinics.
- The goal of the paper form was to streamline the intake and checkout process, help identify possible high-risk conditions i.e. depression, and aid in the efficiency of provider visits.

Aim

- The objective of this study was to assess the rates of completion of depression screening in clinic cancer patients using a PHQ-2 or PHQ-9 on EPIC following the implementation of a standardized nursing intake form.
- This study also aimed to assess the rates of referral to psychology/psychiatry or medical management following the introduction of the nursing intake form.



Primary Care Provider (Enter in EPIC): _____ Language of Preference (Enter in EPIC): _____

INTAKE SECTION

Visit Information Enter in Epic. Inform Provider of any *abnormal* values	Screening Questions Enter answers in Epic		
Chief Complaint: _____	**Falls**		
Allergies: _____	Have you fallen in the past 6 months?	Y	N
Diabetic? YES, NO Glucose: _____ *(< 70 or >350)*	Do you need help standing or walking?	Y	N
Weight: _____ Height: _____	Do you have dizziness or lightheadedness?	Y	N
BP: _____ *(< 90 or >180 DBP >110)*	**Depression (If yes to either complete PHQ 9 in EPIC**		
P: _____ *(< 50 or >110)*	Over the last 2 weeks, have you had little interest or pleasure in doing things?	Y	N
R: _____ *(< 12 or > 20)*	Over the last 2 weeks, have you felt down, depressed, or hopeless?	Y	N
T: _____ *(< 96.4 or >100.4)*	PHQ 9 Score (if applicable)		
Pulse Ox: _____ *(<95)*	**Smoking**		
Pain: _____ (>5) Location: _____	Do you smoke cigarettes?	Y	N
	Do you smoke E-cigarettes?	Y	N
	Pharmacy Name and Address Required:		

Figure 1. Example of Intake Form.

References

1. Meijer, Anna, et al. "Depression screening and patient outcomes in cancer: a systematic review." PloS one 6.11 (2011): e27181.
2. National Comprehensive Cancer Network. (2019). *NCCN Guidelines for Distress Management (version 3.2019).* Retrieved from https://jnccn.org/view/journals/jnccn/17/10/article-p1229.xml
3. National Comprehensive Cancer Network. (2020). *NCCN Guidelines for Patients Distress During Cancer Care (version 2.2020).* Retrieved from https://www.nccn.org/patients/guidelines/content/PDF/distress-patient.pdf

Methods

- Retrospective chart review
- A randomized sample of 100 primary care encounters for patients with a cancer diagnosis seen in the AIMC and UPED clinics between February 2021 and February 2022
- The primary outcome measures were:
  - Documentation of PHQ-2
  - Documentation of PHQ-9
  - Referral to Psychology/Mental Health
  - Medication management addressed in the plan

Results

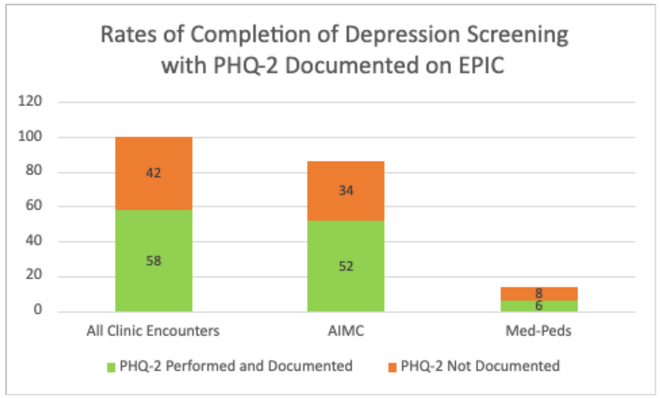


Figure 2. Rates of PHQ-2 Documentation and Completion on EPIC.

	Pre-Intervention (n=100)	Post-Intervention (n=100)
Total Number of PHQ-2 Documented	53.00%	58.00%
AIMC PHQ-2 Documented	52.86%	60.47%
Med Peds PHQ-2 Documented	25.00%	42.86%

Table 1. Rates of PHQ-2 Documentation on EPIC pre-intervention and post-intervention (p=0.5).

- Of 100 encounters, 58 PHQ-2 screens were documented. Only 2 (3.5%) were positive. A reflex PHQ-9 screen was administered and documented on EPIC in one instance, and depression was addressed in the plan with a referral to mental health and medication management.
- In the second scenario, a PHQ-9 screen was not documented, however, depression was addressed in the plan as the patient was already on medication management and following with mental health.
- In one scenario, a positive PHQ-2 screen did not trigger a reflex PHQ-9 screen. However, depression was still addressed in the plan.

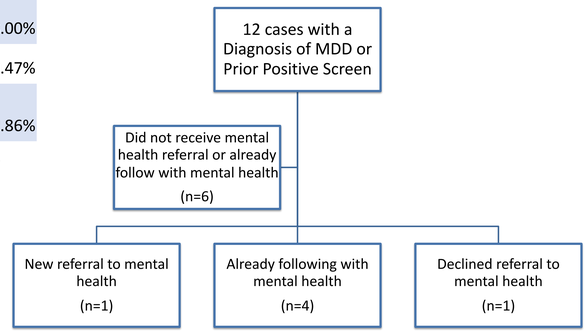


Figure 3. Referral to Mental Health in patients with a prior diagnosis of MDD or history of a positive screen.

Conclusions

- The overall incidence of PHQ-2/PHQ-9 screening and documentation increased from 53% to 58% following the implementation of standardized nursing intake forms in the academic clinics, however, the results were not statistically significant (p=0.5).
- Even when a PHQ-2 or PHQ-9 screen was not entered in EPIC, residents continued to address management of depression in the "Plan" section of their visit encounter in patients with a positive screen or prior diagnosis of MDD.

Discussion

- Many limitations prevent effective documentation of depression screening on EPIC
  - Time constraints in the clinic require technicians to empty the intake room in order to start the next visit and maintain flow.
  - A positive PHQ-2 results in a reflex PHQ-9 which is time-consuming and cumbersome, especially in the setting of a possible language barrier.
  - Suboptimal EPIC user experience leads to limited visibility of screenings.
  - Resident clinicians are only instructed once during clinic orientation on how to access or update this information.
- Performing intake using a mobile workstation or in-room workstation once the patient is roomed may expedite intake documentation.
- Additional training may allow residents to document depression screening when indicated, and offload some of the responsibility from the technician.
- A Best Practice Alert (BPA) on EPIC should be raised if a patient has not had a depression screen performed within the last year. If the screen at a recent encounter or during the current encounter is positive, physicians should be linked to a management order set.
- Lastly, self-completion of intake by patients on MyChart may result in improved outcomes.

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