### Session Objectives

- **Know about quality of care and implementation science as areas of research guiding the improvement of mental health service delivery**

- Understand DEEP Care as an innovative and multimodal initiative designed to both implement and evaluate the translation of "research" based health service interventions into effective community based primary mental health care

### Challenges of caring for people with depression in primary care, include:

- Limited time per patient
- Patients’ attitudes about depression
- Acceptance of the diagnosis of depression and/or recommended treatment
- Discontinuation of medication
- Recognition additional training is needed to keep up to date
Objectives of DEEP Care

- Provide and evaluate an interdisciplinary educational intervention on depression for primary care providers
- Design, implement, and evaluate a practice based strategy that translates depression education and effectiveness research into improved care for patients with depression at selected southwestern Ontario primary care sites (urban, suburban, rural setting)

Evidence-Based Quality Improvement: The State Of The Science

Quality improvement strategies, just like medical interventions, need to rest on a strong evidence base.

by Kaveh G. Shojania and Jeremy M. Grimshaw
• VA Quality Enhancement Research Initiative (QUERI)
  - research findings ➔ translation into practice ➔ better health care practices ➔ better health outcomes

• DEEP Care
  - QUERI framework for using behavior research considerations and findings integrated into each step of design and implementation

Evolution of Quality Improvement and Implementation Research

• Passive diffusion
  ("If you publish it, they will come")

• Guidelines and systematic reviews
  ("If you read it for them, they will come")

• Industrial-style quality improvement
  ("If you TQM/CQI it, they will come")

• Systems reengineering
  ("If you completely rebuild it, they will come")


Collaborative Care for Depression

A Cumulative Meta-analysis and Review of Longer-term Outcomes

Conclusions: Collaborative care is more effective than standard care in improving depression outcomes in the short and longer terms. Future research needs to address the implementation of collaborative care, particularly in settings other than the United States.

Arch Intern Med. 2006;166:2314-2321
• Identify current depression care training needs of southwestern Ontario allied health professionals

• On-line survey (sent through local LHIN) → focus groups

• On-line
  (a) 73 started → 36 completed the entire survey (49%)
  (b) “Almost completely” or “Completely” prepared (within scope of practice/responsibilities) to:
    (i) Screen = 44.5%
    (ii) Diagnose = 38.9%
    (iii) Treat = 38.9%

Survey Results (order of preference):
1. Non-pharmacological management of depression (motivational interviewing, BSFPS, CBT)
2. Selecting and managing medication in mood disorders (i.e. 2nd level Rx interventions)
3. Management of suicidal patients
4. Concomitant medical diseases and mood disorders (i.e. pain and depression)
5. Screening and diagnosis of mood disorders
Evidence of the Effectiveness of Specific Quality Improvement Strategies

Learning from evidence for two chronic illnesses:
(a) Diabetes
(b) Hypertension

- Provider education (+)
- Provider reminders (+)
- Audit and feedback (+++)
- Patient education (+++)
- Disease or case management (+++)

1. Shojania et al., Closing the Quality Gap: Diabetes Mellitus Care, 2004.
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Components of DEEP Care

Evidence of the Effectiveness of Specific Quality Improvement Strategies

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www.deep-care.org
**Depression Educator (DCE)**
Provides patient education and antidepressant prescription counseling at Rx initiation, 2 weeks, and 8 weeks.

**Depression Care Manager (DCM)**
Provides support over the telephone:
- Contacting the patient initially, 8 weeks, and 16 weeks.
- Providing action oriented feedback to physician.
- Assisting physician with care plan implementation.

**Key expectations of each site or group for Model B include identifying a:**
(i) Clinician (DCM)/Coordinator to act as liaison with DEEP Care – (May be shared between offices across sites that form a group)
(ii) Physician as local leader (Remuneration provided for cost offset)
Initial DCM telephone contact
• DEEP Care orientation and basic depression education
• Patient given option to enroll in DEEP Care
• Calls scheduled for 4, 8, and 16 weeks after the index AD Rx

Follow Up DCM telephone contact
• Scripted, semi-structured, follow-up telephone sessions include:
  - assessment of treatment adherence
  - education and shared decision-making to improve treatment adherence (protocol driven)
  - assessment of clinical outcomes (PHQ-9)
  - facilitating follow-up care
• Data compared to an algorithm to generate recommendations by the DCM for the treating physician (facilitates implementation)
• Weekly selective review (15 to 30 min.) with psychiatrist if available

Patient’s initial visit with physician
• Diagnosis of Major Depressive Disorder or Dysthymia
• Patient Health Questionnaire (PHQ-9) administered
• Initial education about depression (pamphlet given)
• Inform about care process and role of DCM
• Index antidepressant (AD) Rx
• Appointments booked for 2-4, 6-8, and 12 wks
Evaluation of DEEP Care

Outcome (Quantitative)

- PRIMARY: Treatment plan adherence
- SECONDARY: Patient symptomatology

Outcome (Qualitative)

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Evaluation of DEEP Care

PRIMARY:
- Treatment plan adherence
- % Patients followed self-care goals throughout study period
- % Patients attended counseling throughout study period
- % Patients took medications throughout study period

SECONDARY:
- Change in PHQ-9 scores over study period
- Difference between initial and final WHO DAS-12 scores

Outcome (Qualitative)
- Focus group: Clinicians (physicians and depression care workers)
- Focus group: Patients

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Evaluation of DEEP Care

Anticipated Benefits

- Less time spent by the physician informing patient’s about depression and medication use
- Fewer patient visits through improved depression care outcomes
- More efficient use of time when patient presents for follow-up visits
- Chronic care based model well positioned to leverage additional funding from MHLTC and/or granting agencies
- Augments care for identified cases
- Therapeutic relationship and patient’s satisfaction enhanced

Summary

- Evidence-based quality improvement and implementation science are key areas of research available to guide the improvement of mental health services
- DEEP Care is an innovative and multifaceted initiative designed to both implement and evaluate the translation of evidence based health service interventions into effective community based mental health care