Inpatient initiation of pharmacotherapy for smoking cessation: a quality improvement initiative

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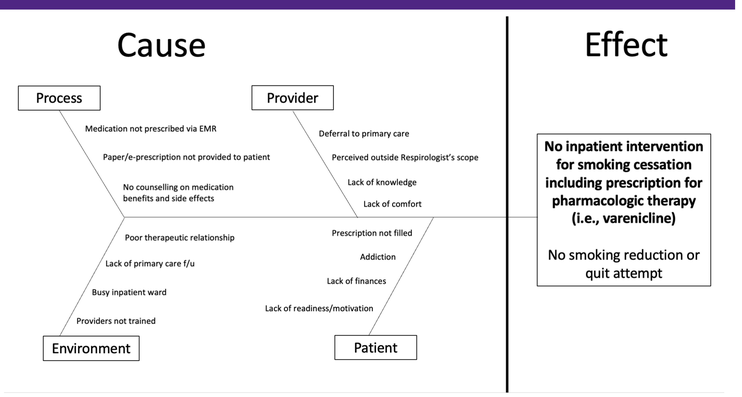
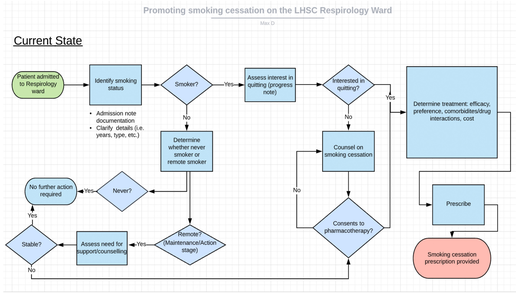
AIM Statement: By June 2023, increase the rate of initiation of smoking cessation therapies by 20% following prescription

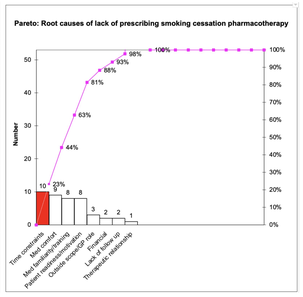
PROBLEM DEFINITION

- Inpatient initiation of smoking cessation management is an accepted intervention to help patients quit smoking (1)
- Inpatients are rarely prescribed interventions to assist with smoking cessation at discharge
- **Baseline data: retrospective chart review of discharged patients (n=59)**
  - Active smokers: 29% (n=17)
  - Never smokers: 37% (n=22)
  - Remote smokers: 34% (n=20)
  - Offered smoking cessation pharmacotherapy: 6% (n=1/17)
- Only 3% of smokers who are untreated will obtain abstinence within a given year (2)
- By increasing prescriptions at discharge, we anticipate more smokers will be able to successfully quit smoking

ROOT CAUSE ANALYSIS







Top 3 Root Causes:
1. Time constraints
2. Medication comfort
3. Medication familiarity

Respirology Quality Improvement Initiative:

Smoking Cessation on the VH Respirology Ward

Rationale[1]:

- 3% of untreated smokers obtain abstinence in any given year.
- With pharmacotherapy, patients are more likely to quit.
- Among patients without interest or motivation to quit, pharmacotherapy is still recommended.

What is the project aim? **Increase initiation rate of smoking cessation therapy at discharge among Respirology ward patients who are active tobacco smokers**

What can you do?

Ask	Advise	Act	Consult	Document
1. Speak to patient 2. Document tobacco use	1. Encourage quitting 2. Offer your help	1. Offer treatment 2. Counsel patient using motivational interviewing	1. Speak with Kendra (Pharmacist) to flag patient for detailed assessment	1. Discharge summary: A) Smoking status B) Pharmacotherapy C) Means of access/pay

Pharmacotherapy: How to choose?

Evidence | Clinical Suitability | Drug Interactions | Patient factors

First-line treatment options:

Bupropion	Varenicline	NRT
Days 1-3: 150 mg PO daily Days 4-12 weeks: 150 mg PO BID - Start 1-2 weeks prior to quit date	Days 1-3: 0.5 mg PO daily Days 4-7: 0.5 mg PO BID Weeks 12-24: 0.5-1 mg PO BID	Days 1-3: 0.5 mg PO daily Days 4-7: 0.5 mg PO BID Weeks 12-24: 0.5-1 mg PO BID

☐ Nicotine Replacement Therapy (12-24 weeks)[2]

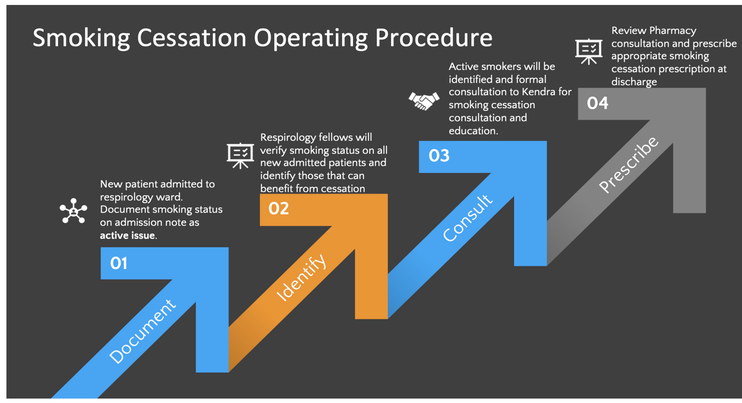
	< 10 cigs/day	10-19 cigs/day	20-29 cigs/day	30-39 cigs/day	40+ cigs/day
Patch[4]	☐ 7mg Patch	☐ 14mg Patch	☐ 21mg Patch	☐ 28mg Patch (21mg + 7mg)	☐ 42mg Patch (21mg X 2) or higher*
If time to first cig is <30 mins after waking, consider higher dose NRT	☐ 14mg Patch	☐ 21mg Patch	☐ 28mg Patch (21mg + 7mg)	☐ 35mg Patch (21mg + 14mg)	☐ _____
Plus *					
Short Acting NRT	☐ Mouth Spray ☐ 2mg Gum ☐ 2mg Lozenge ☐ Inhaler	☐ Mouth Spray ☐ 2mg Gum ☐ 2mg Lozenge ☐ Inhaler	☐ Mouth Spray ☐ 4mg Gum ☐ 4mg Lozenge ☐ Inhaler	☐ Mouth Spray ☐ 4mg Gum ☐ 4mg Lozenge ☐ Inhaler	☐ Mouth Spray ☐ 4mg Gum ☐ 4mg Lozenge ☐ Inhaler

For detailed assessment and detailed medication dosing/contraindications/precautions, see the
Canadian Pharmacist Smoking Cessation Pharmacotherapy Algorithm
Questions? Speak to Max, Ali, Rock or Abdallah (Respirology Fellows)

1. Leone et al. Am J Respir Crit Care Med. 2020 Jul 15;202(2):e5-31.
2. Pharmacists for a Smoke Free Canada/Canadian Pharmacists Association. Smoking Cessation Pharmacotherapy Algorithm. Dec. 2018.

IMPLEMENTATION

1. Trainee education
2. Resource education
3. Pharmacist consultation
4. Patient education



MEASUREMENT & RESULTS

- Process measures:
  - Proportion of patients with documented smoking status
  - Proportion of residents aware of project/tools
- Balancing measures:
  - Resident perception of workload
  - Resident comfort with prescribing
- Outcome measures:
  - Proportion of patients who receive pharmacy consultation
  - Proportion of patients who are discharged with smoking cessation treatment

- **Data: Block 10 Apr 19-May 9/22**
  - Active smokers (n=7)
  - Status documented (5/7)
  - Pharmacist consult documented (4/7)
  - Prescription at discharge (3/7)

SUSTAINABILITY

- Process owner: Key stakeholders - Respirology fellows; Pharmacist
- Documentation of new standards
  - Poster and SOP as tools to give structure to new standard
- Monitoring & response plan
  - Pharmacist consultation → tracking number of patients receiving prescriptions

1. Leone et al. Am J Respir Crit Care Med. 2020 Jul 15;202(2):e5-31.
2. Nahhas et al. J Soc Res Nicotine Tob. 2017 Aug 1;19(8):937-43.