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10 ONLINE SUPPLEMENT

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14 MORBIDITY AND MORTALITY ASSOCIATED WITH 15 PRESCRIPTION CANNABINOID DRUG USE 16 AMONG OLDER ADULTS WITH COPD

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- 1 Other health administrative databases used in our study included:
- 2 a) ICES congestive heart failure (CHF) database: contains individuals with validated physician-
3 diagnosed CHF¹
- 4 b) ICES human immunodeficiency virus (HIV) dataset: contains individuals with validated
5 physician-diagnosed HIV infection²
- 6 c) Ontario Cancer Registry: a validated provincial cancer registry³
- 7 d) Ontario Diabetes Dataset: contains individuals with validated physician-diagnosed diabetes⁴
- 8 e) Ontario Mental Health Reporting System (OMHRS): contains information on all mental health
9 hospital admissions
- 10 f) Ontario Myocardial Infarction Dataset (OMID): contains individuals with acute myocardial
11 infarctions that were associated with hospitalization⁵

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1 Cohort baseline characteristics, before and after propensity score matching (full list of variables included^a)

Baseline characteristics	Prior to propensity score matching			After propensity score matching		
	New users N=2,106	Non-users N=183,770	Standardized difference ^b	New users N=2,106	Non-users N=2,106	Standardized difference ^b
Women (%)	60.4	51.5	0.18	60.4	61.0	0.01
Age (mean ± SD, IQR)	75.4 ± 7.1, 69–80	77.9 ± 8.1, 71–84	0.34	75.4 ± 7.1, 69–80	75.3 ± 7.7, 69–81	0.01
Low income as per ODB (%)	22.2	24.6	0.06	22.2	22.4	0.00
Long-term care residence (%)	10.6	13.6	0.09	10.6	11.4	0.02
Income quintile (%)						
1 (lowest)	26.7	25.6	0.02	26.7	26.5	0.00
2	23.2	22.0	0.03	23.2	22.0	0.03
3	18.9	19.2	0.01	18.9	19.1	0.00
4	16.9	17.4	0.01	16.9	17.9	0.03
5 (highest)	14.0	15.4	0.04	14.0	13.9	0.00
Missing data	0.3	0.4	0.00	0.3	0.6	0.04
Rural residence (%)	17.0	16.4	0.02	17.0	18.1	0.03
COPD duration (%)						
<2 years	21.5	31.7	0.23	21.5	21.1	0.01
2–5 years	19.7	19.1	0.01	19.7	19.5	0.01
>5 years	58.8	49.2	0.20	58.8	59.4	0.01
COPD exacerbation history past year (%)						
0 exacerbations	59.8	58.2	0.03	59.8	59.8	0.00
>=1 outpatient exacerbation	16.3	17.1	0.02	16.3	16.3	0.00
>=1 exacerbation associated with hospital presentation	23.9	24.7	0.02	23.9	23.9%	0.00
COPD exacerbation past 30 days (%)	7.0	11.5%	0.15	7.0	6.2	0.03
Total number outpatient visits past year (mean ± SD)	20.6 ± 13.8	15.3 ± 11.4	0.42	20.6 ± 13.8	20.0 ± 15.1	0.04
Total number hospitalizations past year (mean ± SD)	1.3 ± 1.7	1.0 ± 1.4	0.18	1.3 ± 1.7	1.3 ± 2.0	0.01
Any ICU admission past year (mean ± SD)	10.2	8.6	0.05	10.2	9.9	0.01
Any surgery past year (mean ± SD)	10.4	8.0	0.08	10.4	10.1	0.01
Respiratory medication use past 6 months (%)						
Long-acting beta-agonist inhaler	41.0	37.4	0.07	41.0	41.2	0.00
Long-acting	38.8	37.7	0.02	38.8	38.1	0.01

anticholinergic inhaler						
Inhaled corticosteroid	12.1	13.8	0.05	12.1	11.7	0.01
Oral corticosteroid	23.0	16.1	0.17	23.0	24.0	0.02
Theophylline	2.1	2.0	0.01	2.1	1.6%	0.04
Respiratory antibiotic	53.1	48.3	0.10	53.1	54.7	0.03
Spirometry receipt past year (%)	24.7	24.5	0.00	24.7	24.5	0.00
Non-COPD lung disease^c (%)	38.3	36.2	0.04	38.3	39.0	0.02
Myocardial infarction (%)	11.2	11.6	0.01	11.2	11.0	0.00
Congestive heart failure (%)	29.9	34.3	0.09	29.9	29.9	0.00
Diabetes (%)	36.5	36.1	0.01	36.5	36.8	0.00
Stroke and other cerebrovascular disease^c (%)	12.2	11.2	0.03	12.2	12.2	0.00
Musculoskeletal or connective tissue disease^c (%)	91.7	75.0	0.46	91.7	92.0	0.01
Osteoporosis^c (%)	13.7	10.0	0.11	13.7	12.0	0.05
Psychotic psychiatric disease^c (%)	11.0	6.9	0.14	11.0	11.7	0.02
Non-psychotic psychiatric disease^c (%)	60.5	41.8	0.38	60.5	60.2	0.01
Sleep disorder^c (%)	51.9	47.1	0.10	51.9	51.2	0.01
Dementia^c (%)	20.1	21.5	0.03	20.1	19.1	0.03
Smoking cessation medication^d receipt past year (%)	7.2	3.0	0.19	7.2	6.8	0.01
Benzodiazepine receipt past 3 months	38.0	21.1	0.38	38.0	36.8	0.03
Opioid receipt past 3 months	64.4	22.2	0.94	64.4	65.7	0.03
Serotonergic antidepressant receipt past 3 months	35.8	19.7	0.37	35.8	34.1	0.04
Loop diuretic receipt past 3 months	35.9	36.7	0.02	35.9	36.4	0.01
Cohort entry during influenza season^e (%)	32.3	38.3	0.13	32.3	31.6	0.02
Year of cohort entry (%)						
2006	6.2	9.8	0.13	6.2	6.7	0.02
2007	7.7	10.1	0.08	7.7	8.1	0.01
2008	7.3	8.3	0.04	7.3	7.2	0.00
2009	6.3	7.4	0.04	6.3	6.3	0.00
2010	6.3	7.3	0.04	6.3	6.8	0.02

2011	5.6	7.4	0.08	5.6	6.0	0.02
2012	5.7	7.5	0.07	5.7	5.6	0.01
2013	7.1	8.3	0.04	7.1	6.5	0.02
2014	11.1	9.5	0.05	11.1	10.5	0.02
2015	15.3	12.4	0.08	15.3	15.1	0.01
2016	21.4	12.1	0.25	21.4	21.3	0.00

1 COPD = chronic obstructive pulmonary disease; ER = emergency room; IQR = interquartile range; ODB = Ontario
2 Drug Benefit; SD = standard deviation

3 ^aAn abridged version of this table is found in the manuscript proper

4 ^bStandardized differences of > 0.10 are thought to indicate potentially meaningful differences

5 ^cPresence of comorbidities was based on 3-year look-back from the index date

6 ^dIncludes Bupropion and Varenicline

7 ^eDefined as November 1 to March 31.

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