Appendix 3 (as supplied by the authors): Predictive performance of combinations of variables

	Complete model*	Model excluding dementia, mood disorder, schizophrenia, anxiety	Model excluding de mood disorder, schiz anxiety, other diso substance abuse, reg dose	ophrenia, orders,	Model excluding dementia, mood disorder, schizophrenia, anxiety, other disorders, substance abuse, region, initial dose, sex, antidepressants, concomitant opioid	
Model's AUC	0.8736	0.8728	0.8714		0.8689	
	Model excluding dementia, mood schizophrenia, anxiety, other dis substance abuse, region, initial do antidepressants, concomitant opi index opioid	orders, schizophrenia, anx ose, sex, substance abuse, re oid, CCI, antidepressants, co	mentia, mood disorder, tiety, other disorders, egion, initial dose, sex, ncomitant opioid, CCI, AIDs, antipsychotics	schizopl substanc antidepro index o	cluding dementia, mood disorder, hrenia, anxiety, other disorders, e abuse, region, initial dose, sex, essants, concomitant opioid, CCI, opioid, NSAIDs, antipsychotics, nophen/codeine, acetaminophen	
Model's AUC	0.8650	0.	0.8590		0.8490	
	Model excluding dementia, mood schizophrenia, anxiety, other dis substance abuse, region, initial do antidepressants, concomitant opi index opioid, NSAIDs, antipsych acetaminophen/codeine, acetami prescriber's specialty	orders, schizophrenia, anx ose, sex, substance abuse, re oid, CCI, antidepressants, co lotics, index opioid, NSA nophen, acetaminophen/coc	mentia, mood disorder, tiety, other disorders, egion, initial dose, sex, ncomitant opioid, CCI, AIDs, antipsychotics, deine, acetaminophen, ialty, gabapentinoid	schizopl substanc antidepro index o acetamin	cluding dementia, mood disorder, hrenia, anxiety, other disorders, ce abuse, region, initial dose, sex, essants, concomitant opioid, CCI, opioid, NSAIDs, antipsychotics, iophen/codeine, acetaminophen, r's specialty, gabapentinoid, mode of action	
Model's AUC	0.8405		8296		0.8135	

Béliveau A, Castilloux AM, Tannenbaum C, et al. Predictors of long-term use of prescription opioids in the community-dwelling population of adults without a cancer diagnosis: a retrospective cohort study. CMAJ Open 2021. DOI:10.9778/cmajo.20200076. Copyright © 2021 Joule Inc. or its licensors

Model's AUC	0.7955	0.7342	0.7589	0.7618
	Model excluding dementia, mood disorder, schizophrenia, anxiety, other disorders, substance abuse, region, initial dose, sex, antidepressants, concomitant opioid, CCI, index opioid, NSAIDs, antipsychotics, acetaminophen/codeine, acetaminophen, prescriber's specialty, gabapentinoid, mode of action, benzodiazepines	Model including age and indication only	Model including age and initial prescription duration only	Model including indication and initial prescription duration only

Note: AUC = area under the curve, CCI = Charlson comorbidity index, NSAID = nonsteroidal anti-inflammatory drug.

*Complete model includes: age, sex, CCI, patient region of residence, opioid at index date, concomitant opioid, mode of action, initial dose, initial duration, prescriber's specialty at index date, indication, mood disorder, schizophrenia, anxiety, other disorder, dementia, substance abuse, benzodiazepine, antipsychotics, antidepressants, NSAID, acetaminophen, acetaminophen/codeine, gabapentinoid.