

Supplementary Online Content

Chadi N, Schroeder R, Jensen JW, Levy S. Association between electronic cigarette use and marijuana use among adolescents and young adults: a systematic review and meta-analysis. *JAMA Pediatr*. Published online August 12, 2019. doi:10.1001/jamapediatrics.2019.2574

eMethods. Detailed Database Search Strategy

eFigure 1. Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) Diagram of Study Selection

eFigure 2. Marijuana Use in Youth with e-Cigarette-only Use and Dual e-Cigarette and Tobacco Use in Individual Studies

This supplementary material has been provided by the authors to give readers additional information about their work.

eMethods. Detailed Database Search Strategy

Databases: Pubmed, Embase, Web of Science, ProQuest Dissertation and Theses

1. PubMed

#1 ((Nebulizers and Vaporizers[mesh] AND (tobacco[mesh] OR tobacco[tiab] OR nicotine[mesh] OR nicotine[tiab])) OR (Drug Delivery Systems[mesh] AND (tobacco[mesh] OR tobacco[tiab] OR nicotine[mesh] OR nicotine[tiab])) OR Electronic Cigarette*[tiab] OR E-Cig*[tiab] OR electronic nicotine delivery system*[tiab] OR vape*[tiab] OR Vaping[tiab] OR "Electronic Nicotine Delivery Systems"[Mesh] OR "Vaping"[mesh])

AND

#2 ("Substance-Related Disorders"[Mesh:NoExp] OR "Marijuana Use"[Mesh] OR "Marijuana Abuse"[Mesh] OR "Cannabinoids"[Mesh] OR "Cannabis"[Mesh] OR marijuana[tiab] OR cannabis[tiab] OR cannabin*[tiab] OR "Alcohol-Related Disorders"[Mesh] OR "Alcohol Drinking"[Mesh] OR alcohol[tiab] OR drinking[tiab] OR "Prescription Drug Misuse"[Mesh] OR "Prescription Drug Misuse"[tiab] OR "Street Drugs"[Mesh] OR "street drug*[tiab] OR "Cocaine"[Mesh] OR cocaine[tiab] OR "Narcotics"[Mesh] OR Narcotic*[tiab] OR "Amphetamines"[Mesh] OR Amphetamine*[tiab] OR "crystal meth*[tiab] OR ecstasy[tiab] OR "Morphine Derivatives"[Mesh] OR "Morphine Derivative*[tiab] OR "Tranquilizing Agents"[Mesh] OR "Tranquilizing Agent*[tiab] OR "Designer Drugs"[Mesh] OR "Designer Drug*[tiab] OR "hallucinogens"[Mesh] OR "hallucinogen*[tiab] OR "psilocybin"[Mesh] OR psilocybin*[tiab] OR "Inhalant Abuse"[Mesh] OR "Inhalant abuse"[tiab] OR "cannabinoids/chemical synthesis"[Mesh] OR "Ketamine"[Mesh] OR ketamine[tiab] OR "Phencyclidine"[Mesh] OR "Hypnotics and Sedatives"[Mesh] OR "Drug Users"[Mesh] OR "Drug User*[tiab])

AND

#3 ("Adolescent"[Mesh] OR Adolescent*[tiab] OR Teen*[tiab] OR "Young Adult"[Mesh] OR "Child"[Mesh] OR Child*[tiab] OR youth[tiab] OR "students"[Mesh:NoExp] OR student*[tiab] OR "Minors"[Mesh])

2. Embase

#1 (('electronic cigarette'/exp OR 'vaping'/exp OR 'nebulizer'/exp OR 'drug delivery system'/exp) AND ('tobacco'/exp OR 'nicotine'/exp OR tobacco:ab,ti OR nicotine:ab,ti) OR 'electronic cigarette*':ab,ti OR 'e-cig*':ab,ti OR 'electronic nicotine delivery system*':ab,ti OR vape*':ab,ti OR vaping:ab,ti) AND [embase]/lim

AND

#2 ('drug dependence'/de OR 'cannabis use'/exp OR 'cannabis addiction'/exp OR 'cannabinoid'/exp OR 'cannabis'/exp OR 'marijuana':ab,ti OR 'cannabis':ab,ti OR 'cannabin*':ab,ti OR 'alcoholism'/exp OR 'underage drinking'/exp OR 'drinking behavior'/exp OR 'alcohol':ab,ti OR 'drinking':ab,ti OR 'drug dependence'/exp OR 'street drug'/exp OR 'street drug*':ab,ti OR 'cocaine'/exp OR 'cocaine':ab,ti OR 'narcotic agent'/exp OR 'narcotic*':ab,ti OR 'amphetamine derivative'/exp OR 'amphetamine*':ab,ti OR 'crystal meth*':ab,ti OR 'ecstasy':ab,ti OR 'morphine derivatives'/exp OR 'morphine derivative*':ab,ti OR 'tranquilizer'/exp OR 'tranquilizer*':ab,ti OR 'designer drug'/exp OR 'designer drug*':ab,ti OR 'psilocybin'/exp OR 'psilocybin*':ab,ti OR 'psychedelic agent'/exp OR 'psychedelic agent*':ab,ti OR 'inhalant abuse'/exp OR 'ketamine'/exp OR 'phencyclidine'/exp OR 'phencyclidine*':ab,ti OR 'hypnotic sedative agent'/exp OR 'hypnotic sedative agent*':ab,ti OR 'drug use'/exp OR 'drug use*':ab,ti) AND [embase]/lim

AND

#3 ('adolescent'/exp OR 'adolescent*':ab,ti OR 'teen*':ab,ti OR 'young adult'/exp OR 'youth':ab,ti OR 'child'/exp OR 'child*':ab,ti OR 'student'/exp OR 'student*':ab,ti OR 'minor (person)'/exp) AND [embase]/lim

3. Web of Science

#1 TS=((("Electronic Cigarette*" OR "E-Cig*" OR "electronic nicotine delivery system*" OR "vape*" OR "vaping") AND ("tobacco" OR "nicotine"))) OR "electronic cigarette*" OR "e-cig*" OR "electronic nicotine delivery system*" OR "vape*" OR "vaping")

AND

#2 TS=("drug dependence" OR "cannabis use" OR "cannabis addiction" OR "cannabinoid" OR "cannabis" OR "marijuana" OR "cannabis" OR "cannabin*" OR "alcoholism" OR "underage drinking" OR "drinking behavior" OR "drinking behavior*" OR "alcohol" OR "drinking" OR "drug dependence" OR "street drug" OR "street drug*" OR "cocaine" OR "cocaine" OR "narcotic agent" OR "narcotic agent*" OR "narcotic*" OR "amphetamine derivative*" OR "amphetamine*" OR "crystal meth*" OR "ecstasy" OR "morphine derivative*" OR "tranquilizer*" OR "designer drug*" OR "psilocybin*" OR "psychedelic agent*" OR "inhalant abuse" OR "ketamine" OR "phencyclidine" OR "hypnotic sedative agent*" OR "drug use*")

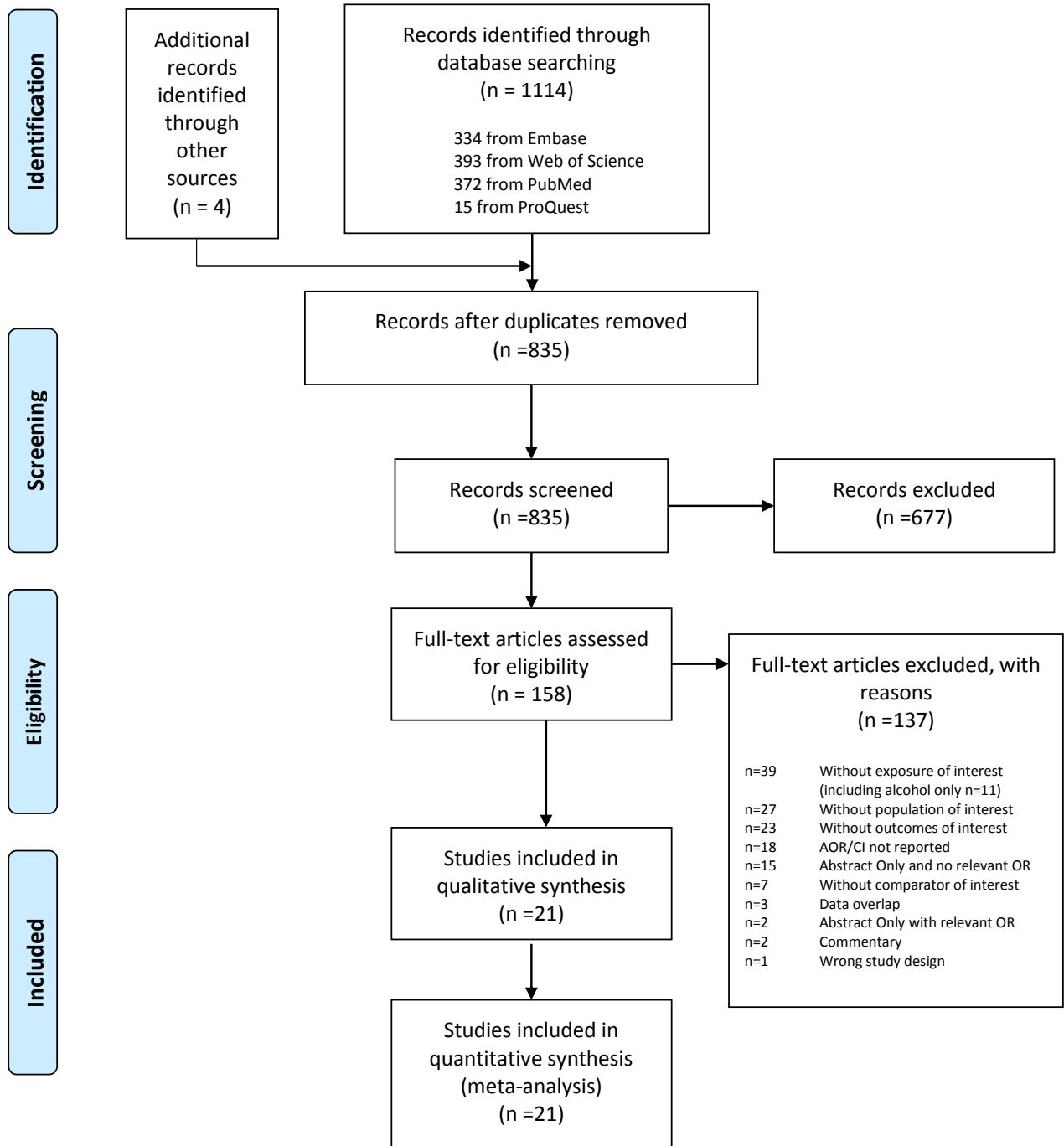
AND

#3 TS=("adolescent" OR "adolescent*" OR "teen*" OR "young adult" OR "youth" OR "child" OR "child*" OR "student*" OR "minor*")

4. Proquest search of abstracts of Dissertations and Theses

ab(("Electronic Cigarettes" OR E-Cig OR E-cigarette OR "electronic nicotine delivery systems" OR vape OR Vaping) AND ("Substance-Related Disorders" OR "drug abuse" OR "illicit drugs" OR "substance abuse" OR "Marijuana Use" OR "Marijuana Abuse" OR Cannabinoids OR Cannabis OR marijuana OR "Alcohol-Related Disorders" OR "Alcohol Drinking" OR alcohol OR drinking OR "Prescription Drug Misuse" OR "prescription drug abuse" OR "street drugs" OR cocaine OR Narcotics OR Amphetamines OR "crystal meth" OR "crystal methamphetamine" OR ecstasy OR MDMA OR LSD OR Morphine OR Opioids OR "Tranquilizing Agents" OR "Designer Drugs" OR psychedelics OR "synthetic cathinones" OR hallucinogens OR psilocybin OR "Inhalant abuse" OR ketamine OR Phencyclidine OR Hypnotics OR Sedatives OR "Drug Users") AND (Adolescents OR Teens OR Teenagers OR "Young Adults" OR Children OR Youth OR Students))

eFigure 1. Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) Diagram of Study Selection



eFigure 2. Marijuana Use in Youth with e-Cigarette-only Use and Dual e-Cigarette and Tobacco Use in Individual Studies

