

Trends in Naloxone use among a sample of people who inject drugs in Tasmania

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Key Findings

- Naloxone is a safe and effective drug to reverse opioid overdose.
- Among a sentinel sample of people that frequently inject in Tasmania, around 1 in 20 report experience of a non-fatal overdose in the past 6 months.
- While awareness of naloxone is high, many consumers are not aware that the drug can be purchased over the counter at pharmacies and almost none had done so in the past six months. This is compounded by the fact that most pharmacies do not carry naloxone in stock and that there remains significant cost barriers for consumers to purchase it.
- Recent years have seen a substantial change in attitudes to naloxone among consumers interviewed in the IDRS, with less than half being willing to carry it.
- Effort needs to be made to understand the concerns that consumers have about the drug in order to increase its uptake in Tasmania.

Introduction

Opioid overdose is a major public health issue responsible for substantial morbidity and mortality (1, 2). People who inject drugs (PWID) often report experiencing non-fatal opioid overdose and a history of injecting drug use is often noted in coronial findings related to deaths induced by opioids (see 1, 2). Interventions to prevent opioid overdose are available, including opioid substitution therapy (OST) and take-home naloxone (3-5).

Naloxone is an opioid antagonist that is used as a safe and effective agent for reversing the effects of opioids, including pharmaceutical opioids (e.g. methadone, codeine, fentanyl, morphine) and illicit opioids such as heroin (6). The primary appeals of naloxone are that it is highly effective in reversing opioid overdose, and in the absence of opioids it essentially has no pharmacological effects. Adverse events following a reversal are typically predictable (acute opioid withdrawal symptoms) although some association with seizure and tachycardia has been identified (7).

Price and Availability

As of 1 February 2016, naloxone can be purchased over the counter in Australian pharmacies (5). It is available as a prefilled syringe or ampoule, 400 microgram/mL and is retailed for around \$17 for 1 x 1ml injection or \$60 for 5 x 1ml injections (5). Take-home naloxone programs are also available, where individuals receive naloxone after completing a naloxone-administration training session (7). *Despite this, the availability of naloxone among Tasmanian pharmacies is currently limited as most do not regularly stock this medication, unless specifically ordered.*

Key Points about Accessing Naloxone Over-The-Counter

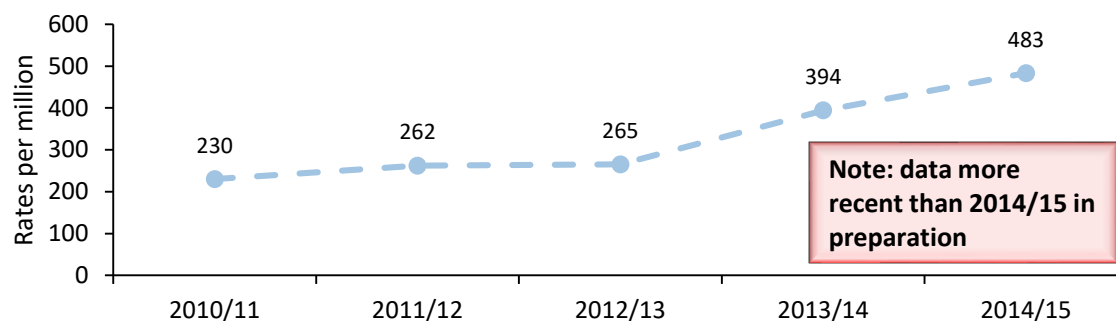
- The prescribing pharmacist must personally hand the medicine to the customer, and this may be supplied directly to the intended consumer or to another person e.g. a relative.
- There is no explicit limit to the quantity that may be provided or the age of the customer. Pharmacists can supply only *“in a quantity and for a purpose that accord with the recognised therapeutic standard of what is appropriate in the circumstances”*.
- The pharmacist does not need to record the customer’s name or other details of the supply
- **It is not an offence to possess naloxone** (8).

Method

This bulletin provides an overview of key data sources that relate to naloxone use in Tasmania. For the methodology of each data source please refer to prior Tasmanian Drug Trends reports (e.g. Bruno et al, 2018). In particular it is important to note that the Illicit Drug Reporting System project focuses on very frequent consumers of substances and are not representative of substance consumers at the population level. A full description of the methodology is available [here](#).

What do we know about adverse events related to opioids in Tasmania?

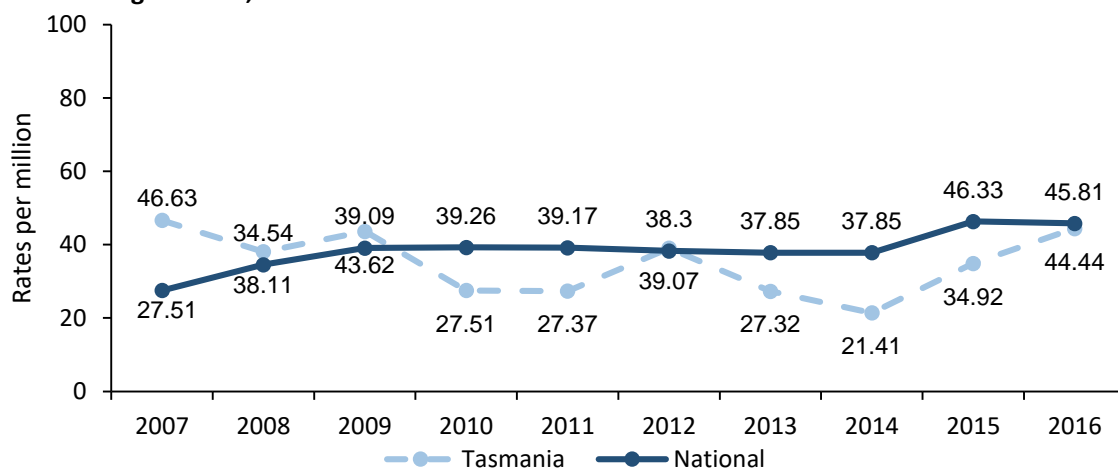
Public hospital admissions among persons aged 15-54 where opioids were noted as the primary factor contributing to admission, rates per million population for Tasmania, 2010/11-2014/15



Source: [Roxburgh and Breen \(2017\) \(9\)](#)

Note: 2015/16, 2016/17 and 2017/18 data were in preparation at the time of publication

Rates of accidental deaths per million persons due to opioid use among those aged 15-54, 2007-2016



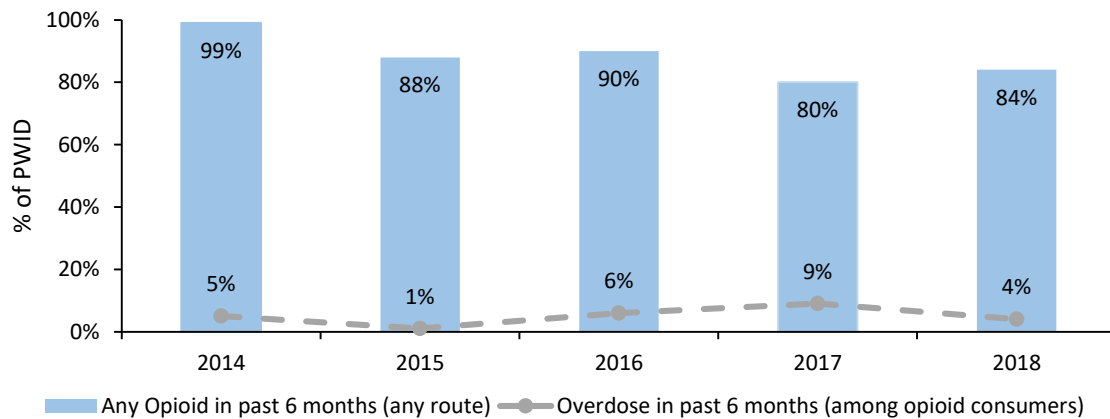
Source: [Roxburgh, Dobbins, Degenhardt & Peacock \(2018\)](#)

Key Points

- The National Drug Strategy Household Survey estimated that 3.3% of the Tasmanian adult population had used a prescribed opioid for non-medical reasons in 2016 (10).
- While we do not have recent data available, trends since 2010 suggest a steady increase in hospital admissions involving opioid use. Rates of opioid-related accidental deaths in Tasmania are consistent with the national average. Both these datasets relate to people using opioids both with and without prescription.

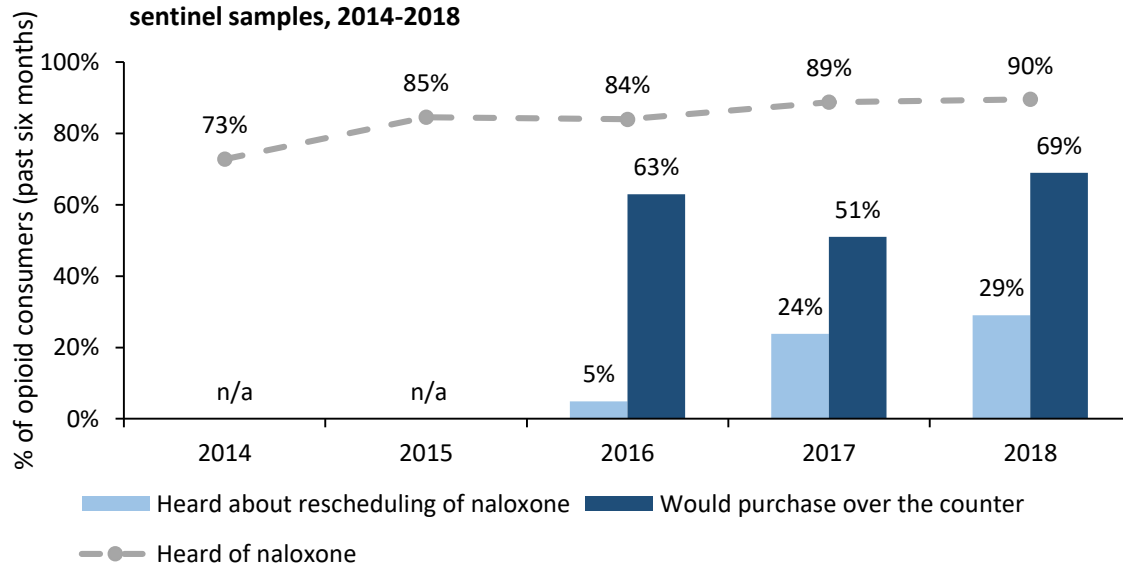
Opioid use and Naloxone Knowledge and Attitudes among Tasmanian samples of people who inject drugs in the IDRS

Rates of Opioid Use and Overdose Among Tasmanian PWID sentinel samples, 2014-2018



Source: IDRS Interviews

Knowledge of Naloxone Among Recent Opioid Consumers in Tasmanian PWID sentinel samples, 2014-2018



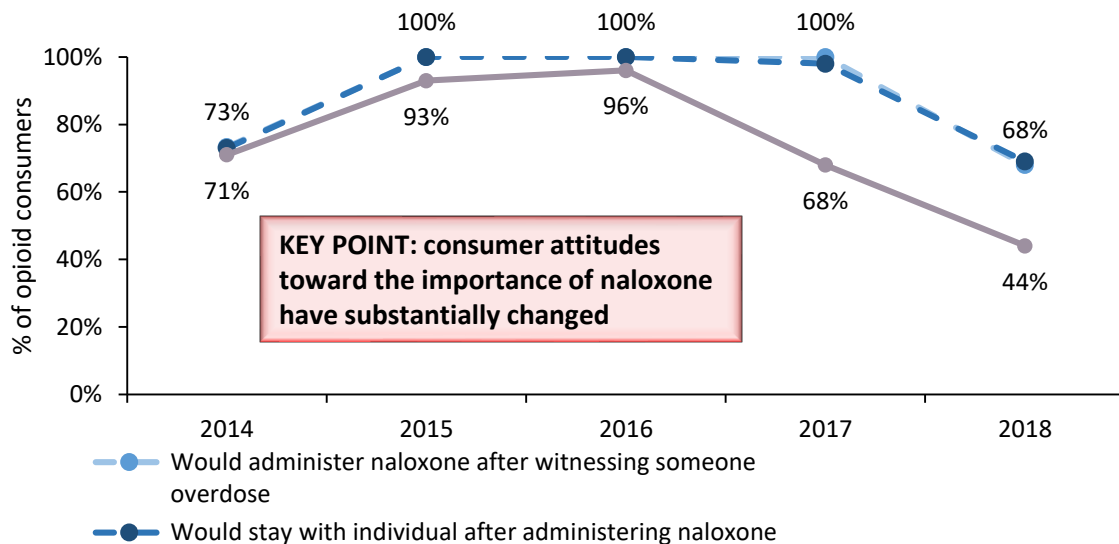
Source: IDRS Interviews

* note: questions regarding the rescheduling of naloxone were not asked prior to 2016

Key Points

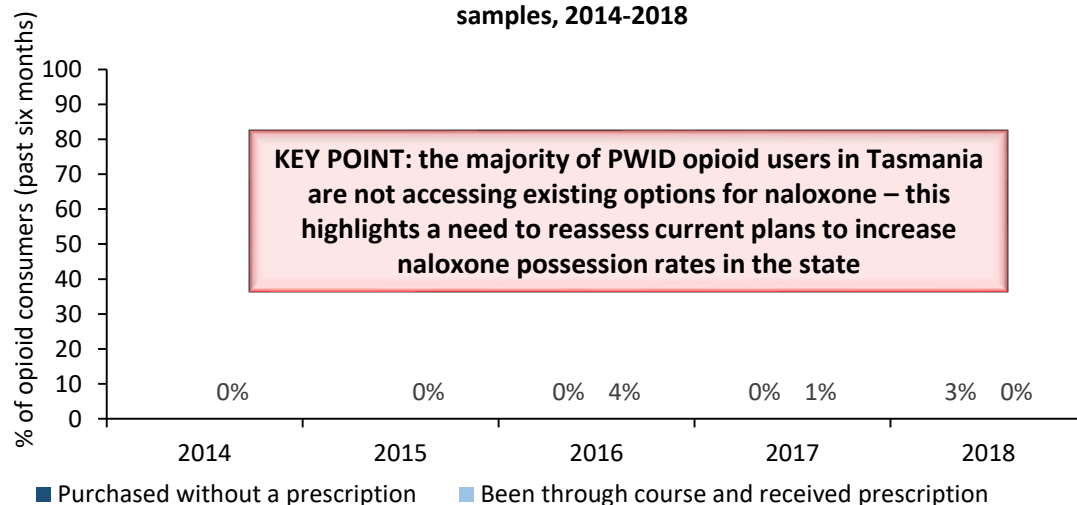
- The majority of people interviewed as part of the IDRS in Hobart report injecting opioids and around 1 in 20 also report experiencing a non-fatal overdose in the previous six months.
- Nine in 10 had heard about naloxone, but only two-fifths would carry it with them.
- Most of the people interviewed for the IDRS were aware of naloxone, but less than 1 in 3 were aware that it was available for purchase over the counter, despite the rescheduling occurring in 2016.
- More than 2 in 3 of those interviewed for the IDRS in 2018 noted that they would purchase naloxone over the counter.
- These findings highlight a substantial gap between awareness of naloxone and what it does and knowledge of how to access it.

Proportion of Tasmanian PWID Sentinel Samples Who Would Carry or Administer Naloxone, 2014-2018



Source: IDRS Interviews

Naloxone program involvement and purchasing in Tasmanian PWID sentinel samples, 2014-2018

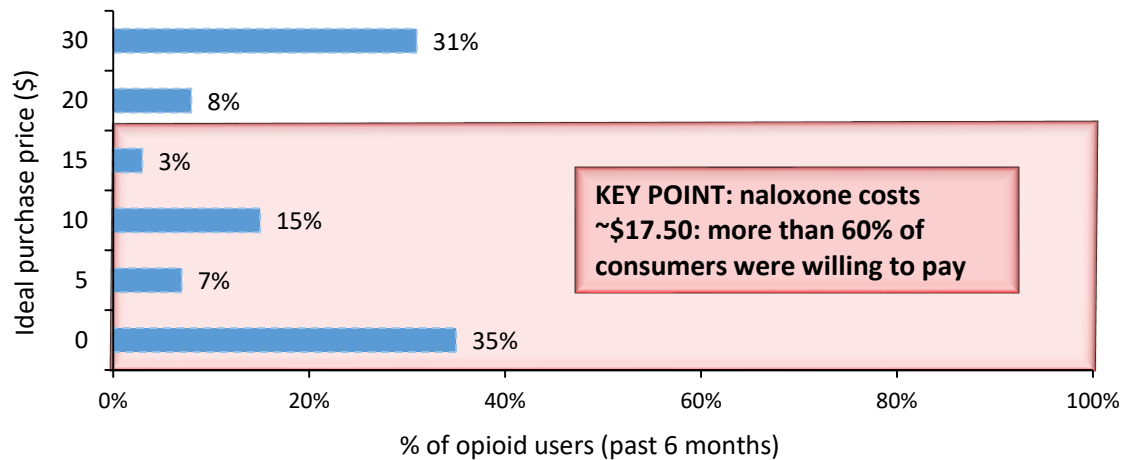


Source: IDRS Interviews

Key Points

- Consistent with the low level of awareness of how to access naloxone, in 2018 only 3% of those interviewed for the IDRS had purchased naloxone, and none had been through a training course.
- There appears to have been a substantial change in attitudes towards the importance of naloxone since 2016 – among opioid consumers, willingness to carry naloxone with them has fallen sharply from almost all of those interviewed to less than half. Likewise, only 2 in 3 reported a willingness to administer naloxone in the event of an overdose.
- In order to improve the uptake of naloxone in this group, the reason for this change in attitude needs to be determined. The decline in willingness to carry naloxone may relate to perceptions that it is 'not necessary' in the Tasmanian context, a fear of potential legal risk if apprehended with the drug, or that it may not be effective.

Ideal Purchase Price of Naloxone Reported by Tasmanian PWID samples, 2018



Source: 2018 IDRS Interviews

Key Points

- In Australia, naloxone is available as a prefilled syringe or ampoule, 400 microgram/mL and is retailed for around \$17 for 1 x 1ml injection or \$60 for 5 x 1ml injections
- In 2018, only 4 in 10 PWID opioid users reported that they would be willing to pay over \$15 for the treatment
- With a prescription, the cost of naloxone (5 x 1ml) is reduced to a flat rate of \$39.50, and for those with a health concession, further to \$6.40. However, this would also involve the inconvenience and cost of a GP consultation, which may not be appropriate for some individuals.

Summary

- Rates of use of opioids and experience of non-fatal overdose remain common among people who frequently inject drugs in Tasmania.
- Tasmania is one of the only states in Australia that does not have existing naloxone programs.
- In order to increase the use of naloxone among Tasmanians effort needs to be made to understand the concerns that consumers have about the drug. It is likely that there are both systematic (e.g. cost and availability) and attitudinal (e.g. legal concerns) barriers to the use of naloxone in Tasmania.

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