MAGISTRATES COURT of TASMANIA

CORONIAL DIVISION

Record of Investigation into Death (Without Inquest)

Coroners Act 1995
Coroners Rules 2006
Rule 11

(These findings have been de-identified in relation to the name of the deceased, family, friends and others by direction of the Coroner)

I, Simon Cooper Coroner, having investigated the death of MC

Find, pursuant to Section 28(1) of the *Coroners Act* 1995, that

a) The identity of the deceased is MC;

b) MC died in the circumstances set out further in this finding;

c) The cause of MC's death was combined drug intoxication; and

d) MC died in February 2016 in Southern Tasmania.

Background

1. MC was born in Canada in 1993. He was a self-employed software developer and medical student aged 22 years at the time of his death. He was in a relationship with MK. He arrived in Australia in 2012.

2. Plainly very highly intelligent, MC was engaged in software design and development from his early teens and as he grew to adulthood was both employed and self-employed in a variety of roles in the IT industry. In 2012 he enrolled in a medical degree at the University of Tasmania which led to him leaving Canada and moving to this country.

3. MC had a lengthy and complicated medical history. Although no medical records were obtained from Canada as part of this investigation, his complete medical records in this state were obtained and carefully examined. Those records indicate that between his arrival in Tasmania in 2012 and his death just over four years later

he seems to have seen at least eight different general practitioners, two psychiatrists, an ear, nose and throat surgeon, an endocrinologist, a pain specialist, a gastroenterologist, a clinical psychologist and a physiotherapist.

4. The evidence suggests that MC suffered severe pain from an injury to his spinal cord. That pain in turn caused significant ongoing health problems for him and necessitated treatment by a number of different healthcare professionals in efforts to manage his chronic pain. It also led to MC endeavouring to self-medicate using drugs obtained from a variety of sources.

5. In addition to the chronic pain attributable to his spinal condition, MC suffered anxiety and depression for which he was treated with a variety of medications from at least 2013.

6. The evidence clearly satisfies me that in the 12 months or so leading up to his death MC appears to have deliberately presented to a number of different doctors in attempts to obtain opioid medication. Doctors subsequently interviewed as part of the investigation under the *Coroners Act* into MC's death, indicate that he asked for specific medication and would demonstrate at the very least annoyance when they refused to prescribe the drugs he requested. It is unnecessary to traverse the details of his medical history in Tasmania in the circumstances of this finding. The extent and nature of MC's drug-seeking behaviour is detailed in various psychiatric and psychological assessments furnished to me as part of the investigation.

7. In early 2015 MC's drug-seeking behaviour had been brought to the attention of the Pharmaceutical Services Branch (PSB). The PSB commenced an investigation and provided advice and direction to various pharmacies from which MC had been attempting to obtain drugs.

8. It is also apparent on the evidence that when MC experienced difficulty obtaining schedule 8 opioid based drugs from what might be termed 'normal sources' in this state, he researched alternatives and ordered drugs online. In particular, he ordered the drug U-47700, an opioid analgesic. Evidence obtained after his death indicates that when sourcing that drug, one neither tested nor approved for human use, he signed a declaration acknowledging that the substance he had purchased was not to be used for human consumption.

Circumstances of Death

9. In early January 2016 MC and MK commenced living together as partners. At all relevant times MK was a resident medical officer at the Royal Hobart Hospital.

10. On the morning of 11 February 2016 MK awoke to his alarm at 7.00am. He subsequently told investigators that at that time MC was still asleep. He got out of bed and had a coffee. MK knew from an earlier conversation with MC that he had an appointment with a lawyer at 9.00am. At 8.30am he went to wake MC up and found that he was already awake. MK then left on a walk.

11. After completing his walk MK went to a local food store where he bought some groceries, paying with a bank debit card. At about 10.55am he left the grocery store and went straight home, arriving within a matter of minutes.

12. When MK entered the apartment he could hear the shower running. The shower continued to run for a considerable period of time as MK made himself some food. MK thought nothing much of the duration of the shower, later telling investigators that it was not uncommon for MC to shower for up to an hour. Eventually, at about 12.25pm, he knocked on the bathroom door and called out to MC. He did not receive an answer and therefore walked in to the bathroom where he found MC unconscious on the floor. MK was unable to find a pulse. Using his stethoscope he tried to listen to MC's lungs but could hear nothing. He called an ambulance and with the assistance and advice of the emergency dispatch operator he commenced and continued CPR. MK noticed a small butterfly needle on the ground in the bathroom which he moved from the position where he found it on the floor and placed on the counter of the sink. Ambulance officers arrived about 10 minutes after MK's call. They moved MC from the bathroom to the lounge room of the apartment to give more space to attempt CPR and fibrillation. The latter was unsuccessful. It was apparent that MC was deceased and attempts at resuscitation were, quite properly, not continued.

13. Police attended at the request of the ambulance service. The first officers arrived at about 1.00pm. An investigation in relation to MC's death was commenced immediately. A thorough search was conducted by detectives and a number of exhibits seized which included various used syringes, an alcohol swab and butterfly syringes, pages of medical literature, various powders and drugs, several USB drives, computer equipment (including laptop computer hard drive and a memory

card), MC's mobile telephone, digital scales, snap lock bags containing drugs, a pill crusher and a mortar and pestle. Extra detectives from Southern Drug Investigation Services attended the scene to assist with the investigation as did two officers from Southern Forensic Services.

14. The apartment was forensically examined. MC's body was forensically examined and photographed *in situ*. Nothing at the scene suggested the involvement of any other person in MC's death. The forensic officers saw no injuries which could have accounted for his death, although bruising around his mouth and face was noticed.

15. When the investigation of the scene was completed, and after formal identification, MC's body was removed from the apartment and transported to the mortuary at the Royal Hobart Hospital.

Forensic Pathology Evidence

16. At the mortuary, the Tasmanian State Forensic Pathologist, Dr Christopher Hamilton Lawrence, carried out an autopsy. The autopsy revealed pill fragments in MC's stomach as well as recent and older needle marks. No injuries which could have caused or contributed to MC's death were identified at autopsy, although Dr Lawrence noted bruising around MC's mouth area. Samples taken at autopsy were subsequently analysed at the laboratory of the Forensic Science Service Tasmania. A number of drugs were located as having been present in those samples. Significantly the drug U-47700 was found to have been present in MC's body at the time of his death, along with Venlafaxine (within the reported toxic range), Dextromethorphan (at greater than therapeutic levels), Bupropion (also at greater than therapeutic levels), as well as therapeutic levels of Mirtazapine, Promethazine and Propranolol.

17. Dr Lawrence expressed the opinion, which I accept, that the cause of MC's death was combined mixed drug intoxication.

18. Forensic scientist, Dr Miriam Connor, provided a report as part of the investigation into MC's death. In that report she said that "*U-47700 was identified in the femoral blood sample analysed. U-47700 is a new psychoactive substance, a potent synthetic opioid that is considered to be 7.5 times more potent than morphine. The effects of U-47700 have never been studied in humans and it is not registered for*

medical use in humans. There is little information available within the scientific literature, although there are two recent published case reports fatalities associated with the use of U-47700. U-47700 is considered to be a derivative of AH-7921, another synthetic opioid, and is currently being used as an opioid "legal high" as substitute for other strong opioids such as morphine, heroin and fentanyl, as the substance is not scheduled or controlled". Dr Connor went on to say that "*excessive doses may result in death due to respiratory arrest and pulmonary oedema*".

The Investigation

19. A number of the exhibits seized from the apartment were subsequently examined for DNA. Those exhibits included the combination of swabs of syringes, needles and a butterfly attachment. All of the samples analysed yielded a major profile DNA match for MC.

20. In addition, a number of the exhibits seized were forwarded for drug and chemical analysis. Various drugs including U-47700, Venlafaxine, Dextromethorphan, Bupropion, Mirtazapine, Promethazine and Propranolol were positively identified as a result of that analysis as being present in some or all of the exhibits seized.

21. MC's mobile telephone and hard drive were subsequently forensically examined. A number of text messages deal with MC's use of drugs and attempts to obtain them as well. Two messages sent by MC roughly a fortnight before his death made allusions to suicide. However, no other electronic material suggesting MC intended to take his own life was identified. In addition, nothing in the nature of a written suicide note was located during the search of the apartment.

22. MC's Google search history was examined. Search terms entered indicate that MC had been actively researching U-47700 in the months leading up to his death.

23. MK was interviewed on the day of MC's death. That interview was audio visually recorded. In the interview MK told the investigators in some detail about MC's sourcing of drugs from overseas on the Internet. In particular, he told investigators of the arrival of a 'Fed-Ex' type delivery to MC in early 2016. I am satisfied on the evidence that the delivery was of the drug U-47700 and that MC tried it that day, reporting later to MK that it was "great" and assisted to control his pain. MK told

investigators that MC was not using drugs recreationally as such but rather was self-medicating in an effort to control his pain.

24. During the interview MK spoke of the volatile nature of his and MC's relationship. He denied being responsible for the bruising on MC's face and mouth noticed by forensic officers at the scene and by Dr Lawrence at autopsy. There is no evidence to suggest that he was so responsible and even if he was (and I am not satisfied that this was so) then the bruising about MC's mouth area neither caused nor contributed to his death.

25. Finally, MK claimed to have never encouraged MC to experiment with medications, although he admitted he was well aware that he was doing so. There is no evidence to suggest that this is anything other than the truth and no evidence to suggest that MK was involved in prescribing drugs to MC or their supply. That having been said, text messages reviewed as part of the investigation clearly indicate that MC sought lignocaine, diazepam and adrenaline from MK. However, I note that there is no evidence which would allow me to conclude that MK in fact supplied any or all of those drugs to MC. Moreover, none of those drugs, even if supplied, seem to have played any part in MC's death.

Conclusion

26. I am satisfied to the requisite legal standard that the cause of MC's death was mixed drug toxicity. There is no evidence that MC's death was anything other than accidental and no evidence to suggest the involvement of any other person in his death.

27. Finally, I am satisfied that there is no basis to criticise any individual or entity for their action or inaction with respect to MC's death.

Comments and Recommendations

28. I extend my appreciation to investigating officer, Senior Constable Luke Griffiths, for his investigation and report.

29. The circumstances of MC's death are not such as to require me to make any comments or recommendations pursuant to Section 28 of the *Coroners Act* 1995.

30. I convey my sincere condolences to the family and loved ones of MC.

Dated 19 March 2018 at Hobart in the State of Tasmania.

Simon Cooper
Coroner