

# **Prescribing Drugs of (Potential) Abuse**

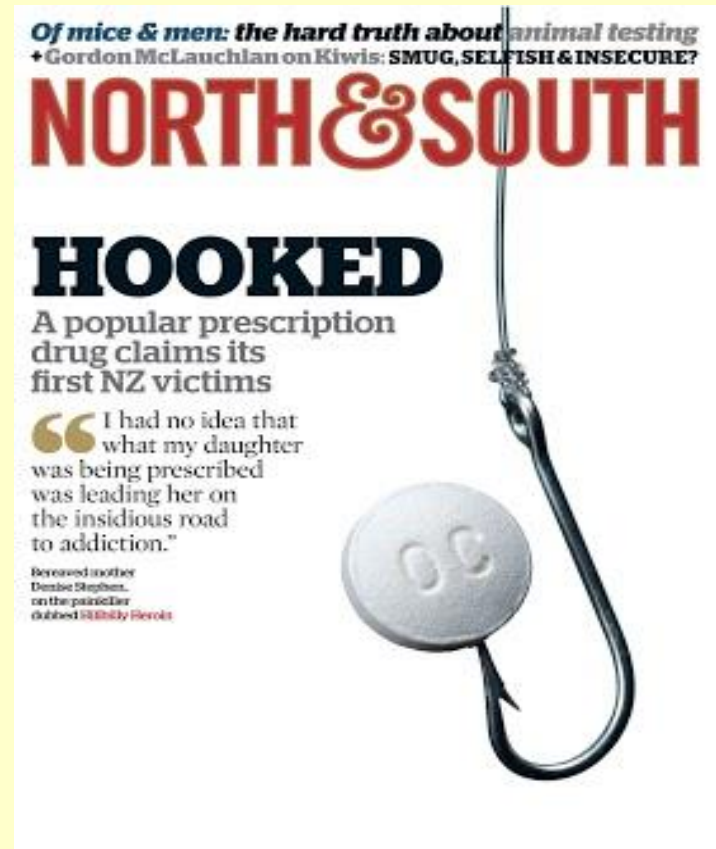
**Dr Chris Cameron  
Clinical Pharmacologist & Physician,  
Wellington Hospital**

**Prescribing Workshop  
NPNZ conference  
5<sup>th</sup> September 2014**

# **What I'll cover**

- **Prescribing drugs of abuse**
- **Addiction vs. Tolerance Vs. Dependence**
- **Safe prescribing practices and expected standards**

# Freya, 20y



# **Freya, 20yo**

- **Otago University student**
- **Slipped and hurt her back 18 mo ago**
- **Attended her GP and was prescribed NSAIDs, codeine & physio initially**
- **Didn't improve- started on oxycodone**

# Freya

- **Dose escalation now 100mg twice a day**
- **“It’s not working- the pain is worse!”**
- **After attempting to reduce dose, she became unwell with tremor, anxiety, diarrhoea**

# Freya

- **Freya began seeing other GPs and requesting more oxycodone and other opioids**
- **After fears about her GP reducing her dose, she began injecting her oxycodone**
- **She also began abusing other drugs**

# Freya

- **2 years after the initial consultation Freya died of a methadone OD**
- **The methadone was her mother's**
- **How could this happen?**

- Freya's mother was an ED nurse
- She thought that oxycodone was “about the same strength as codeine or Voltaren”
- Many people would assume that...



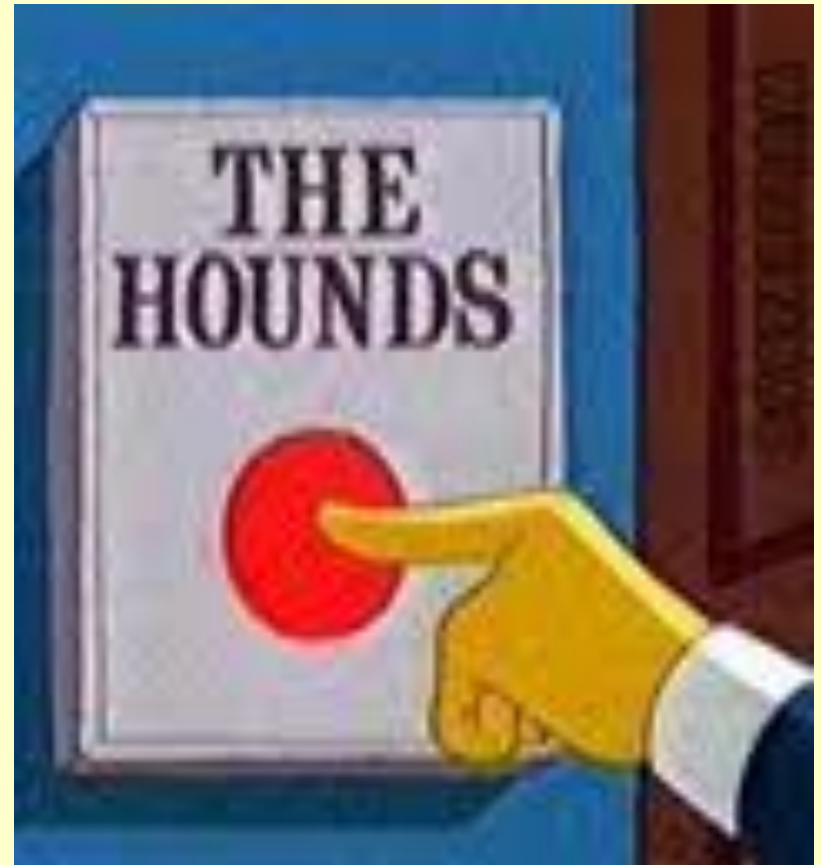
# A new permissiveness

- **Doctors were encouraged to think about patients' pain severity on a self-reported numerical score as a 5th vital sign (like blood pressure and temperature).**



# A new permissiveness

- **Opioids like oxycodone were framed as safer alternatives to NSAIDs like ibuprofen, that could trigger peptic ulcers or heart failure/MI**



# A new permissiveness

- **Medical students and junior Drs were instructed that patients could never become dependent on opioids if prescribed for legitimate pain.**



# A new permissiveness

- **Medical students and junior Drs were instructed that patients could never become dependent on opioids if prescribed for legitimate pain.**



# A new permissiveness

- **“With modern day analgesia no patient should have to suffer pain”.**



# A new permissiveness

- **“With modern day analgesia no patient should have to suffer pain”.**



# **That's all very well but...**

- **Patients can become addicted to opioids while in pain**
- **Opioids are good for acute pain**
- **Chronic pain treatment modalities are different to acute pain**
- **Many patients will never be pain-free. It is unrealistic to aim for this. A meaningful reduction**



# **What's the problem?**

- **Physical dependence on opioids occurs after 10 days.**
- **Addiction is a psychological diagnosis involving one or more of the following behaviours:**
  - **Poor control over drug use**
  - **Compulsive drug use**
  - **Continued use of a drug despite physical, mental and/or social harm**
  - **A craving for the drug**



- **Remember, dependence occurs after 10 days**
- **Almost everyone taking an opioid for > 2 weeks will be “dependant” but only a small number are “addicted”**

# **Dependence and Addiction**

## **(WHO/DSM- IV)**

- **Indicated by the presence of three or more of the criteria listed below in the last 12 months.**
- **Tolerance**
- **Withdrawal symptoms**
- **Continued use of drug despite harm**
- **Loss of control**
- **Attempts to cut down**
- **Salience**
- **Reduced involvement**

# **In the land of mixed messages...**

- **If opioids cause a physical dependence after 10 days...**
- **Who gets addicted?**
  - **5-10% people have “primed brains”**
    - **Genetics**
    - **Co-existent mental health issues**
    - **Youth**
    - **“Troubled youth”**

- If opioids are given for  $> 10$  days, there will need to be a gradual reduction in dose or the patient will have withdrawal symptoms

# **Drugs of Abuse: Not Just Opioids**

- **Opioids and other pain killers**
- **Stimulants**
- **Anti-anxiety drugs**
- **Sedative/hypnotics**
- **Feel good drugs  
(antidepressants)**
- **Look good drugs (steroids)**
- **“Feeling goofy” drugs  
(psychedelics)**

# NZMC guidance on prescribing drugs of abuse



- **Improper prescribing: “Differs significantly from that of ones peers, indiscriminate, excessive or reckless”**

# **The Law**

- **The Misuse of Drugs Amendment Regulations 2014 allows NPs to prescribe controlled drugs within their scope of practice for:**
  - **Up to 1 month's supply for Class A and B controlled drugs**
  - **Up to 3 months' supply for Class C controlled drugs.**

# **Responsibility of Prescribers**

- **When prescribing drugs with potential for abuse ensure the person you are prescribing for is not:**
  - **dependant on such drugs**
  - **seeking such drugs to supply to other persons**
  - **a restricted person**



# Acute vs. Chronic Pain

- **Acute pain is for survival**
- **Chronic pain serves no purpose**
- ***“Sufferers of chronic pain suffer for nothing”***
- **Concern in acute pain: what pain does the patient have?**
- **Concern in chronic pain: what patient does the pain have?**

# **Chronic Pain and Addiction: Common Features**

- **Chronic pain**

- Early trauma
- Loss of mastery
- Loss of control
- Loss of sense of self
- Cognitive error
- “personalization”
- Over interpretation
- “catastrophy”

- **Addiction**

- Early trauma
- Loss of mastery
- Loss of control
- Loss of self efficacy
- Cognitive error
- “nirvana”
- Denial

# History

**What predicts addiction?**

- Personal history of drug abuse**
  - Family history of drug abuse**
  - Current addiction to alcohol or cigarettes**
  - History of problems with prescriptions**
  - Co-morbid psychiatric disorders**
- 
- *Same predictors as in non-pain patients***

# **In the USA...**

- **Approximately 6% of the U.S. population (15.1m people) reported abusing controlled prescription drugs in 2003, higher than the combined number abusing cocaine (5.9m), hallucinogens (4m), inhalants (2.1m) and heroin (328,000).**
- **Abuse of controlled prescription drugs has been increasing at a rate twice that of marijuana, 5x greater than cocaine and 60x greater than heroin.**

# **In the USA**

- **CDC report (released 25 Feb 2013)**
- **“In 2010 more than 38,329 people died from drug overdose.”**
- **“Of those deaths, 22,134 were from prescription drugs like OxyContin, Vicodin and Methadone”.**  
**(Vicodin = hydromorphone)**
- **The USA has 4.6% of the world's**

# Prescribing is more than knowing a lot about drugs

- “In many medical schools pharmacotherapy teaching is characterised by the transfer of knowledge about drugs, rather than by the skill to treat patients.”

- Coombes, Stowasser, UQ 2001

# Good Medical Practice: Safe prescribing practices & expected standards



- **Prescribing drugs or treatment**

You may prescribe drugs or treatment, including repeat prescriptions, only when you:

- have adequate knowledge of the patient's health
- are satisfied that the drugs or treatment are in the patient's best interests.
- Usually this will require a have a face-to-face consultation with the patient or discuss the patient's treatment with another registered health practitioner who can verify the patient's physical data and identity. You may not need a face-to-face consultation if you are prescribing on behalf of a colleague in the same team who usually practises at the same physical location.

# Medical Council guidance on expected standards



- Surprisingly little, but...
- Must be in the patient's best interests
- Implication is disclosure of benefits and risks for patient to decide
- A special case for unregistered drugs (Sections 25 and 29)



- Was treatment with oxycodone in Freya's best interests?

# Responsibility of Doctors

- When prescribing drugs with potential for abuse ensure the person you are prescribing for is not:
  - dependent on such drugs
  - seeking such drugs to supply to other persons
  - a restricted person



# Treatment of people dependent on controlled drugs

- Section 24 of the Act prohibits prescribing to a person whom the prescriber believes to be dependent on that or any controlled drug, unless that prescriber:
  - is a gazetted practitioner; or
  - is working in a gazetted agency; or
  - has an authority to prescribe for a particular patient

- The NZMC recommends contacting Medicines Control if there are concerns regarding a patient
- It was not clear from the N&S article if Medicines Control were contacted about Freya

# Medicines Control

- Doctors can contact Medicines Control send in a 'Request for a Restriction Notice' form about the patient and the problem.
- Medicines Control's monitoring of prescriptions may result in the issuing of a restriction notice after contacting doctors or pharmacies for information

# Doctor fined for illegal prescribing

Fri, 20 Jul 2012 12:24p.m

Stuff.co.nz

- A LOWER HUTT DOCTOR HAS BEEN ORDERED TO PAY NEARLY \$40,000 AFTER HE PRESCRIBED WEIGHT-LOSS DRUGS AND SEDATIVES TO A PATIENT FOR YEARS, **DESPITE KNOWING OF HER ADDICTIONS AND THAT SHE WAS ON A PRESCRIPTION BLACK LIST.**
- The STOKES VALLEY GP HAD 37 YEARS' EXPERIENCE, HAS BEEN FOUND GUILTY OF PROFESSIONAL MISCONDUCT CHARGES BY THE HEALTH PRACTITIONERS DISCIPLINARY TRIBUNAL.
- THE CHARGES RELATED TO THE PERIOD BETWEEN 2000 AND 2010.
- THE DR PRESCRIBED THE WOMAN DUROMINE, AN APPETITE SUPPRESSANT AND TRIAZOLAM.
- SHE HAD BEEN PUT ON A DRUG RESTRICTION NOTICE IN 1996, ABOUT THE TIME SHE STARTED SEEING HIM AS A GP.

- THE WOMAN WAS DESCRIBED AS A DIFFICULT PATIENT AND IN 2006 THE GP NOTED "HOW CAN I GET RID OF THIS PATIENT!!" BUT DID NOT REFER HER FOR TREATMENT OR STOP PRESCRIBING.
- THE SITUATION CAME TO LIGHT WHEN ANOTHER DOCTOR SAW THE WOMAN WHILE THE GP WAS ILL AND SUSPECTED SHE WAS SELLING THE DRUGS.
- A WELLINGTON PHARMACY ALSO RANG THE GP TO SAY STAFF HAD SEEN HER SELLING DRUGS SHE HAD JUST COLLECTED, BUT HE SAID IT WAS ONLY “THEIR WORD AGAINST HERS AND HE WOULD CONTINUE TO PRESCRIBE”.
-

# Competency of the practitioner while prescribing

- The Health Practitioners Competence Assurance Act 2003 (the Act) is about public safety. Its purpose is to protect the health and safety of members of the public by providing mechanisms to ensure the life long competence of health practitioners.

The image shows two identical sample prescription forms, Form 34100, from Rx Systems Inc. Each form is for a prescription dated 12/23/2003, written by Dr. AARDEMA, AUSTIN A. The patient is ANDERSON, CHRISTINE M, DOB: 01/01/1933, residing at 12345 S.W. 45 STREET APT #4 Miami, FL 33156. The pharmacy is located at 12345 S.W. 45 STREET APT #4 Miami, FL 33100, with phone (305) 999-9999. The Rx number is 600000.

The top form is for Coumadin 1mg tablets. The prescription is: Rxs: COUMADIN 1MG TABLET Quantity: 30.0. The instructions are: Sig: TAKE ONE TWO TIMES A DAY. USE AS INDICATED. The refill is 2 time(s). The form has checkboxes for "DISPENSE AS WRITTEN" and "SUBSTITUTION PERMISSIBLE", both of which are currently unchecked.

The bottom form is for Poly-Vi-Flor 0.5mg tablets. The prescription is: Rxs: POLY-VI-FLOR 0.5MG TABLET Quantity: 30.0. The instructions are: Sig: TAKE ONE THREE TIMES A DAY. The refill is 2 time(s). The form has checkboxes for "DISPENSE AS WRITTEN" and "SUBSTITUTION PERMISSIBLE", both of which are currently unchecked.



# Competence

**HPCAA focuses strongly on competence in setting out the functions of the MCNZ, which include:**

- (a) to prescribe the qualifications required and to accredit educational institutions
- (b) to review and promote the competence of doctors
- (c) to recognise, accredit and set programmes to ensure the ongoing competence of doctors
- (d) to receive and act on information
- (e) to notify employers ... “may pose a risk”

# 4 strategies to ensure competence

- Set defined standards & skills for practice
- Set the framework for re-certification
- Establish relationships to share information and manage risk
- Assess and investigate competence, health and conduct of individual doctor



# HDC Case 04HDC19938

- Mrs B, aged 37, consulted Dr A at a medical centre on 18 October 2004 for treatment of a migraine headache. Dr A had not seen Mrs B before as she was the patient of another doctor at the medical centre.
- Dr A prescribed propranolol, unaware that Mrs B suffered from moderate to severe asthma.
- Propranolol is contraindicated for people who suffer from asthma.
- Shortly after taking an initial dose of propranolol, Mrs B suffered a severe asthma attack.
- Her condition progressed to respiratory arrest and, later, cardiac arrest. She was taken by helicopter to a public hospital. She had sustained severe brain damage as a result of lack of oxygen and later died.



## HDC Case 04HDC19938

- Dr A had provisional vocational registration as a GP, subject to ongoing supervision.
- This involved a supervisor reporting to the MCNZ on a three-monthly basis.
- Dr A had two supervisors, one of whom was practising at the medical centre.

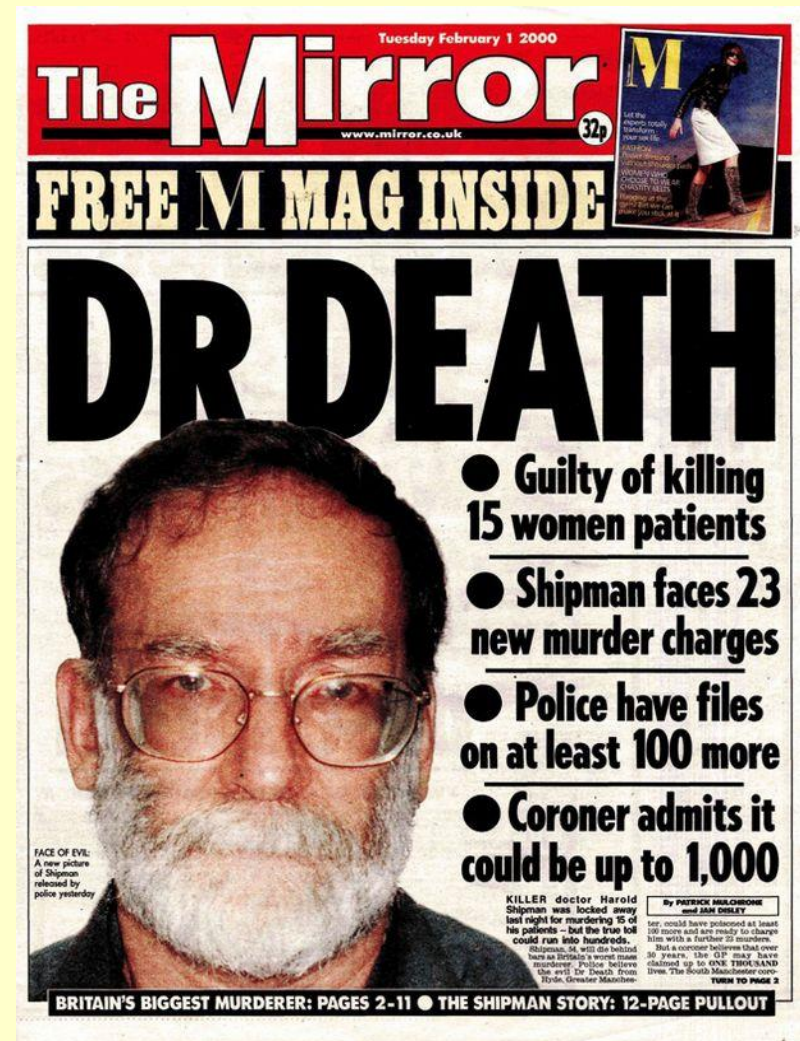
- This case demonstrates the difficulties of ensuring competent prescribing if a major failure breaches the safety nets ie. the community pharmacy, the nurser, the patient & family
- Continued lesser breaches are more likely to be detected

# How to ensure competent prescribing

- Ensure (medical) qualifications has adequate component of safe prescribing (Modification of HPCAA (a))
- Set the framework for re-certification in prescribing? (b)
- Establish relationships to share information and manage risk
- Assess and investigate competence, health and conduct of individual doctor

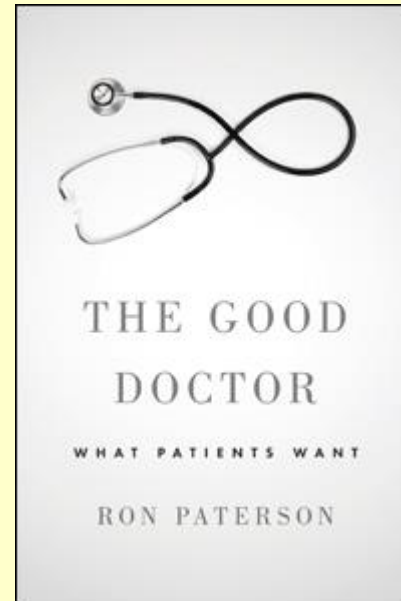
# Example of incompetent prescribing

- Establish relationships to share information and manage risk **X**
- Assess and investigate competence, health and conduct of individual doctor **X**



# Read this...

- First an admission...
- Much of the next section is my translation of Prof Ron Paterson's book
- I recommend the book





# **Recertification**

## **by Ron Paterson**

- “Recertification based on the current Australasian model of CPD is inadequate. The choice of CPD as a marker for competent practice may be defensible on grounds of pragmatism and expense, but it does not absolve boards of their duty to ensure that every licensed practitioner remains fully competent”.
- Doctors do not always recognise their own learning deficits and needs.

# Recertification by Ron Paterson

- “The most effective medical education for doctors is based on their own work environment and individual practice.

CPD should be based in the real work of the doctor. And if this is accepted, it takes us down the pathway of individualised educational and developmental initiatives”.

- Whilst all doctors would benefit from feedback – from colleagues and patients –some groups of doctors pose a higher risk to public health and safety than other:
- Doctors on a general scope of practice pose a higher risk than vocationally trained doctors.
- Doctors working in isolation pose a higher risk than doctors working in teams.
- Doctors 35+ years postgraduation pose a higher risk than doctors 10, 15 or 20 years postgraduation.

# Good Medical Practice: Safe prescribing practices & expected standards



- **Prescribing drugs or treatment**

You may prescribe drugs or treatment, including repeat prescriptions, only when you:

- have adequate knowledge of the patient's health
- are satisfied that the drugs or treatment are in the patient's best interests.
- Usually this will require a have a face-to-face consultation with the patient or discuss the patient's treatment with another registered health practitioner who can verify the patient's physical data and identity. You may not need a face-to-face consultation if you are prescribing on behalf of a colleague in the same team who usually practises at the same physical location.

# **Overseeing prescribing by other health professionals**

Some other health professionals have legal and independent prescribing rights. If you are working in a team with other health professionals, offer appropriate advice when needed to help ensure patient safety.

# Standing orders

More and more, other health professionals work in teams with doctors. Some teams delegate to non-doctors the responsibility for initiating and/or changing drug therapy. If the non-doctor prescriber is working from standing orders, then the responsibility for the effects of the prescription rests with the doctor who signed the standing order.

Support your non-doctor colleagues in these situations by:

- regularly auditing the non-doctor prescriber
- making yourself available by phone for advice.

# Medical Council guidance on expected standards



- Surprisingly little, but...
- Must be in the patient's best interests
- Implication is disclosure of benefits and risks for patient to decide
- A special case for unregistered drugs (Sections 25 and 29)

# MR AP

- Mr AP is 82yo
- He complains of insomnia and is prescribed quetiapine 25-50mg nocte
- After 6 months he saw his GP complaining of a dry mouth and polyuria, and was found to have developed T2DBM
- He had also gained 10Kg



# MR AP

- Quetiapine is an atypical anti-psychotic drug.
  - It is not registered/licensed in NZ for insomnia
  - Among it's numerous ADRs are weight gain, metabolic syndrome and T2DBM
  - Mr AP should have been warned of these
  - He is using it “off-label”, or Section 29
  - 96% psychiatrists in Canterbury found to be using off-label quetiapine in one study
- 
- NZMJ 10 June 2011, Vol 124 No 1336; ISSN 1175 8716

# Delegated prescribing

- Currently in NZ, several occupational groups can prescribe
  - Doctors (unlimited)
  - Midwives
  - Dentists
  - Nurse prescribers (incl Diabetes nurses pending)
  - Clinical Pharmacists
  - Pending Opticians/Podiatrists

# Prescribing Pharmacists

- Pharmacists who have undertaken the advanced training will work with a designated medical practitioner who acts as a mentor and provides advice in the team environment.
- Diagnosis and wider patient management remains the role of the medical practitioner.

# The WHO Guide to Good Prescribing

- |          |  |
|----------|--|
| Step 1:  | Define the patient's problem                 |
| Step 2:  | Specify the therapeutic objective            |
| Step 3a: | Choose your standard treatment               |
| Step 3b: | Verify the suitability of your treatment     |
| Step 4:  | Start treatment                              |
| Step 5:  | Give information, instructions, and warnings |
| Step 6:  | Monitor (and stop?) treatment                |

WHO 6-step model of rational prescribing (de Vries et al., 1995a).

# Step 1

- Define the patient's problem
- ie'. Diagnose what's wrong with the patient before you prescribe a drug (or an operation, or a physical manouvre)
- This makes prescribing problematic for “non-diagnosing” health professions & mandates a therapeutic relationship with a doctor

# Sometimes patients “don’t behave”

- Step 6
- They come back after you started them on drug A with indigestion/palpitations/gout/headache and you need to work out if this is a side effect/interaction/new problem ie. A new diagnosis must be made
- Back to Step 1

# Sometimes drugs ‘don’t behave’

- Step 2: Specify the therapeutic objective  
Step 3a: Choose your standard treatment
- Step 3b: Verify the suitability of your treatment
- Unfortunately, what might seem the best treatment for a sprained ankle may not be the best treatment for a gastric ulcer or heart failure.

# Prescribing is more than knowing a lot about drugs

- In many medical schools pharmacotherapy teaching is characterised by the transfer of knowledge about drugs, rather than by the skill to treat patients.

- Coombes, Stowasser, UQ 2001



# Meeting the expected standards of drug prescription in New Zealand

- What is the expected standard?
  - Patient will have a diagnosis (define the problem) & management plan
  - Agree on a therapeutic objective
  - Choose the correct drug & dose (disease, renal & hepatic function, weight, age, interactions)
  - Monitor Rx. Adjust dose if needed
  - Troubleshoot

- Unfortunately, the wheels can come off at any step!
- Thank-you
- Any questions?



# References

- Guide to good prescribing. A practical manual. De Vries, T. WHO Geneva, 1994
- Good Prescribing Practice. MCNZ April 2010
- Why do interns make prescribing errors? A qualitative study. Ian D Coombes, et al. Med J Aust 2008; 188 (2): 89-94.
- McKean A. NZMJ 10 June 2011, Vol 124 No 1336; ISSN 1175 8716