### Opioid Substitution Treatment

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#### Opioid Substitution Treatment in Custodial Settings A Practical Guide







BIS-Verlag der Carl von Ossietzky Universität Oldenburg



## Opiates in treatment for opiate dependency

**Agonists** (Methadone, slow release morphines) and **partial agonists** (Buprenorphin):

Substitution treatment

Opiate-like effect

Stimulate opiate receptor

Alleviate/stop craving

No rush

Maintain physical dependence

#### **Antagonists**

(naltrexone and naloxone)

Blocking or aversion treatment

Block action of opiates

Block opiate receptor

Don't alleviate craving

No rush

No physical dependence

### Goals of substitution treatment

- Reduce the use of illicit drugs
- Reduce injecting drug use and concomitant harms
- Reduce the risk of drug related death
- Enable to undergo and maintain treatments
- Reduce re-offending and re-imprisonment
- Stabilize personal, social, professional life
- Improve health and well-being

# Substitution strategies

Detoxification: short-term (<1mo)

long-term (>1mo)

Maintenance: short term (>6mo)

long-term (>6mo  $\rightarrow$  years)

Low threshold: easy entry, harm reduction and QoL

oriented, flexible

High threshold: selection criteria, abstinence oriented,

regular urine testing, inflexible discharge

policy, compulsory psychotherapy

"no single treatment is effective for all individuals, therefore services should be sufficiently varied and flexible to respond to the needs of clients, their severity of dependence, personal circumstances, motivation and response to interventions. The rational management of opioid dependance calls for the balanced combination of pharmacotherapy, psychotherapy, psychosocial rehabilitation and risk reduction interventions."

### Requirements for substitution treatment

- Diagnosis of opiate dependency
- Fully informed consent including
  - limits of confidentiality (registration)
  - control of intake and other rules
  - obligations of patient and therapist
- Individualized dosis and treatment
- Avoidance of stigmatisation
- Treatment of co-morbidities

### OST and infectious diseases HIV/HC and TB

 OST stabilizes lifestyle for undergoing treament without interruption

 Challenging management of side effects and drug interactions

# Substitution agents

Medication Route	q	Starting dose	Dose range	Increase by decrease by	Overdose risk	Withdrawal
Methadone oral-enteral	q 24 hours	10-20 mg	40-120 mg	10mg/ wk 5mg/wk	+++	++++
Buprenorphine sublingual	q 24 to72 hours	4-8 mg	8-24 mg	2-4mg/wk 2mg/wk	+	+
Slow- release morphine oral-enteral	q 24 hours	60 to 200 mg	400-1200 mg	30-60mg/wk 30-60mg/wk	+++	+++

### Methadone

#### **Side effects**

QT prolongation

Increased perspiration

Constipation

Sleep disturbances

Reduced libido

Reduced concentration

Weight gain

Protracted detoxification

#### Metabolism:

t/2: 20-37 (10 -80) hours

Cytochrome P450

**Inhibitors** 

Antifungals –azoles

**Antiretrovirals** 

Macrolides

Grapefruit

**Inducers** 

Alcohol

**Aniticonvulsants** 

Antidepressants

**Antiretrovirals** 

Rifampicin

## OST: Evidences from Metaanalyses

- Reduction of mortality (M>B)
- Reduction of illicit drug use (M>B)
- Reduction of HIV infection rate
- Reduction of relapse rate
- Retention in care and treatment
- Decrease in criminal activity
- Cost-effective (M>B)
- Higher doses > lower doses
- Adjusted doses > fixed doses
- With psychosocial treatment lower relapse rate

# OST and pregnancy

- Methadone safe, buprenorphine less data
- Cave withdrawal: risk of spontanous abortion
  in 1<sup>st</sup> trimesterand premature labour in 3<sup>rd</sup> trimester
- 2<sup>nd</sup> and 3<sup>rd</sup> trimester: increase dose of methadone (increased metabolism)
- Cave: neonatal abstinence syndrome (shorter with buprenorphin)
- Breast feeding possible (low methadone levels in milk)

## OST for dependent prisoners

- Improves prison safety (less drug seeking behaviour)
- Reduces self-harm and suicide in prison
- Reduces post-release death rate
- Reduces re-offending and re-imprisonment
- Facilitates treatment and care during and after imprisonment

# Requirements for OST in prison

- Appropriate staffing
- Training of medical and non-medical staff
- Professional independence of health care staff
- Interprofessional co-operation
- Communication with community services
- Continuity of care on transfers and release
- Monitoring, evaluation and optimisation

# The essence of medical ethics in prison

- 1. The primary task of the prison doctor and the other health care workers is the health and well-being of the inmates.
- 2. The <u>7 essential principles</u> for the practice of prison health care, as set out by the CPT:
- Free access to a doctor for every prisoner
- Equivalence of care
- Patient consent and confidentiality
- Preventive health care
- Humanitarian assistance
- Professional independence
- Professional competence

## Medical ethics and OST in prison

- Free access to detoxfication and maintenace OST, psychosocial care and continuity of care
- OST according to need of the individual patient and not to the needs of the prison: Complete professional independence in indication, doses and treatment recommendations
- Equivalent services and choices as in the community
- Continous informed consent and as much confidentiality as possible
- Close cooperation with community services for continuity of care
- No involvement in drug testing or drug checks for security reason

### Group work: OST in prison

- 1) How would you explain the benefits of OST programmes in prison to lay persons?
- 2) What are/were the greatest obstacles to implementation/roll-out of OST programmes in prisons and how to overcome them?
- 3) Describe adverse side effects of OST in prison as observed or reported and recommend strategies to minimize them

### Short term detoxification

Methadon: 10-20 mg/d, reduce 1-2 mg/day

Buprenorphin: 10 mg/d, reduce 2mg/day

α-adrenergic agonists

Clonidin 4 x 100-300mg taper over 5 days Lofexidin 2 x 0.4-0.6 mg taper over 7 days Guanfacin 1 x 0.25-0.5 mg taper over 3 days

### Risks of substitution treatment

- Fatal overdose
- Diversion of drugs, abuse and trafficking
- Stigmatisation