OPIOID USE DISORDER & PREGNANCY
PRENATAL AND PERIPARTUM CARE

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SERVICES OFFERED AT CHAPA-DE

Primary Care

- Prenatal care/Family Planning
- Behavioral Health/Psychiatry

Lifestyle classes

- Gym with personal trainer & classes

Diabetes Management

- Dental/Optometry
- Addiction Services
- Psychiatry/Therapy
PROCESS

Screening
Patient identified by MA during screening questions and addiction screening
RN contacted

RN-led MAT program
RN gets referrals through SBIRT, phone calls and providers and conducts initial assessment

MD collaboration
RN consults with MAT MD to admit patient to program. Baseline labs ordered, patient meets MD and is scheduled for an induction appointment.
SCREENING FOR SUBSTANCE USE IN PREGNANCY

How do you ask your pregnant patients?

Remember the “4P’s”

• Parents: Do the patients parent’s use substances?
• Partner: Does the patient’s partner use substance?
• Past: Does the patient have a history of substance abuse?
• Pregnancy: Have they used anything during this pregnancy?
PROGRAM STRUCTURE

Phase I
Patient is induced and admitted to this phase where he/she will attend group weekly with uds.

Phase II
Patient is seen at group every 2 weeks

Phase III
Patient is seen by MD monthly

Patient is induced and admitted to this phase where he/she will attend group weekly with uds.
CENTERING MODEL OF PREGNANCY AND MAT

Improving health by transforming care through Centering groups
Centering empowers patients, strengthens patient-provider relationships, and builds communities through these three main components

**Health Assessment**

Both provider and patient are involved in the health assessment. Patients receive one-on-one time with their provider and learn to take some of their own assessments. This engages them in their own self-care or care of their child.

**Interactive Learning**

Engaging activities and facilitated discussions help patients to be more informed, confident and empowered to make healthier choices for themselves, their children and their families.

**Community Building**

One person’s question is another one’s question. Patients quickly find comfort in knowing they are not alone. Participation in group care lessens the feelings of isolation and stress while building friendships, community and support systems.
QUESTIONS?
CASE PRESENTATIONS
WHEN DISCUSSING DRUG USE DISORDER WITH A PREGNANT PATIENT, REMEMBER...

✧ The expecting mother is scared
✧ She is desperate to hear that the baby is doing alright
✧ She is facing stigma (at home, in society)
✧ The expecting mother is actively looking for prenatal care
CONSIDERATIONS DURING PREGNANCY

1) Social Support
   a) Engaging community programs (home health RN, family, WIC, housing resources)

2) Access to Treatment
   a) Policy implications
   b) System in place for pregnancy and access to MAT

3) Neonatal Withdrawal Syndrome (NAS)
   (transitions of care)
HEROIN (AND OTHER OPIOIDS)

• Heroin readily crosses the placenta, and pregnant women using heroin (untreated) have a 6-fold increase in risk of obstetrical complications and a 74-fold increase in risk of sudden infant death syndrome

(Dattel 1990; Fajemirokun 2006; Ludlow 2004)
OPIOID USE DISORDER

Opioids do not cause birth defects, or placental insufficiency.

Opioid physiologic dependence develops in the mother and fetus.

Opioid withdrawal has potential risks in pregnancy.

Am J Obstet Gynecol 1975 M1; 122(1)43-6
Fetal stress from methadone withdrawal
Zuspan FP, Gumpel JA
WITHDRAWAL SYMPTOMS

EARLIER
- Fever
- Anxiety
- Insomnia
- Hypertension
- Aching muscles
- Profuse sweating

LATER
- Diarrhea
- Goosebumps
- Craving opioids
- Stomach cramps
- Constant nausea
- Onset of Depression
OPIOID USE IN PREGNANCY

• 22 yo F G5P2012 presents at 9 weeks to your office. She had started taking pills for chronic pain after an MVA 3 yrs ago and currently taking 180 norcos/month bt sometimes more from a friend.

• Past tx: She has tried methadone on the street, tried tapering without success.

• Social: She lives with her partner who does not use but they are in the process of becoming homeless because he just lost his job. They don't have insurance.

• This is an unintended but desired pregnancy and she would like to hear options for treatment.
WHAT DO YOU RECOMMEND FOR TREATMENT?

- Medically supervised taper off opioids
- Buprenorphine
- Methadone
- Vivitrol
WHAT WOULD YOU RECOMMEND?
MEDICATIONS FOR ADDICTION TREATMENT: METHADONE

Methadone Maintenance leads to improved perinatal outcomes compared to women who continue active drug use.
MEDICATIONS FOR ADDICTION TREATMENT: METHADONE

- For non-pregnant patients, goal is a dose that extinguishes opioid use, typically 80-120 mg once a day.

- For pregnant patients, goal is a dose that prevents withdrawal symptoms. This can be a wide range from 10 - 200 mg daily or divided BID.
MEDICATIONS FOR ADDICTION TREATMENT: METHADONE

Methadone Maintenance Outcomes:

- Improved birth weight
- Reduced preterm delivery
- Neonatal Abstinence Syndrome (NAS)

Addiction (1997) 92(11) 1571-1579
The relationship between maternal use of heroin and infant birth weight
Hulske GE, Milne E
MEDICATIONS FOR ADDICTION TREATMENT: BUPRENORPHINE

• Very high affinity
• Partial agonist (agonist - antagonist) at the mu opioid receptor
• Typical dose ranges from 8 mg-32 mg daily
• Best dosing is QID for pain
• Suboxone = sublingual buprenorphine / naloxone
• Subutex = sublingual buprenorphine (only)
## MEDICATIONS FOR ADDICTION TREATMENT

<table>
<thead>
<tr>
<th>Buprenorphine</th>
<th>Methadone</th>
</tr>
</thead>
<tbody>
<tr>
<td>Partial μ agonist</td>
<td>Full μ agonist</td>
</tr>
<tr>
<td>36–48 hour half-life</td>
<td>24–36 hour half-life</td>
</tr>
<tr>
<td>Daily or alternate day dose frequency</td>
<td>Daily dose frequency</td>
</tr>
<tr>
<td>Less abuse potential</td>
<td>More abuse potential</td>
</tr>
<tr>
<td>Ceiling effect limits overdose risk</td>
<td>No protective overdose factors</td>
</tr>
<tr>
<td>Limited to mild–moderate dependence</td>
<td>More effective for severe dependence</td>
</tr>
<tr>
<td>Mild withdrawal symptoms</td>
<td>Moderate/severe protracted withdrawal</td>
</tr>
<tr>
<td>Tablet preparation—risk of injection</td>
<td>Oral liquid*—less risk of injection</td>
</tr>
<tr>
<td>Moderately expensive</td>
<td>Tablet preparation is available</td>
</tr>
<tr>
<td></td>
<td>Inexpensive</td>
</tr>
</tbody>
</table>

*Methadone is sometimes prescribed as an intravenous preparation.*

### Neonatal Abstinence Syndrome after Methadone or Buprenorphine Exposure

**Double blind, double dummy, randomized**

<table>
<thead>
<tr>
<th></th>
<th># Babies</th>
<th>Treated for NAS</th>
<th>Peak Score</th>
<th>Total cum. morphine dose</th>
<th>Length of NAS treatment</th>
<th>Total LOS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Buprenorphine</td>
<td>58</td>
<td>47%</td>
<td>11.0</td>
<td>1.4 mg</td>
<td>4.1 days</td>
<td>10 days</td>
</tr>
<tr>
<td>Methadone</td>
<td>73</td>
<td>57%</td>
<td>12.8</td>
<td>10.4 mg</td>
<td>9.9 days</td>
<td>17 days</td>
</tr>
</tbody>
</table>

89 methadone 20 - 140 mg

86 buprenorphine 2 - 32 mg
Methadone vs. Buprenorphine?
QUESTIONS?
POSTPARTUM CARE

• Continue current methadone dose
• Discharge will have to be coordinated with Methadone Maintenance Clinic
• Continue current buprenorphine dose
• Doses and be increased by buprenorphine provider
POSTPARTUM CARE: VAGINAL DELIVERY

- NSAIDs may be more effective than opioids (if no contraindications). Ex. Toradol
- Short acting opioids are not likely to cause relapse (maintenance therapy prevents this)
- Should be stronger opioid to overcome buprenorphine blockade
- Should short duration prescription
- REMEMBER: Can be triggering behaviorally/emotionally

POSTPARTUM CARE: C-SECTION

- In addition to overcoming opioid tolerance we have to overcome the patient's fear of undergoing treatment
- Sometimes aggressive early treatment reduces overall opioid requirement, but let patients guide what they need for pain control.
METHADONE/BUPRENORPHINE MAINTENANCE

- Continue current methadone or buprenorphine dose
- Maintenance dose may not prevent pain (can reduce it)
- Opioids are less effective but not ineffective
- Patients have very high tolerance to opioids (and partially blocked with buprenorphine)
- Short acting high affinity opioids should be used for pain relief
- Very high doses may be needed
BREASTFEEDING: METHADONE

• The amount of methadone delivered to a baby via breast milk is less than 1% of the morphine given to treat neonatal abstinence.

• Studies show shorter duration of NAS treatment for babies who are breastfed.

J Hum Lactat 2009; 25; 199
Transfer of Buprenorphine into Breast Milk and Calculation of Infant Dose
Lindemalm S; Nydert, P
BREASTFEEDING: BUPRENORPHINE

Studies of breast milk show exposure to be low.
As oral bioavailability is low, even less absorbed.
No evidence of harm in several very small series.

Buprenorphine and metabolites have been found in infant urine.
No infant serum levels have been reported.

J Hum Lactat 2009; 25; 199
Transfer of Buprenorphine into Breast Milk and Calculation of Infant Dose
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QUESTIONS?