



Toxicology Screening (TS) Policies/Practices for Perinatal Substance Use in New York State (NYS) Birthing Hospitals (BH)

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ABSTRACT

Background: The prevalence of pregnant women with substance abuse disorder (SUD) has increased dramatically over the last decade. Delivery and birth hospitalizations present an opportunity to identify and treat the pregnant women and neonates at risk for neonatal abstinence syndrome. TS is an important tool in this process, however policies/practices vary across BHs. The purpose of this study was to assess the variation in TS policies/practices in NYS BHs.
Methods: The NYS Department of Health, NYS Perinatal Quality Collaborative administered a survey to all BH in NYS asking their policies/practices for TS of pregnant women and neonates during the delivery/birth hospitalizations. One survey per BH was completed by an obstetrical/neonatal team using Survey Monkey. Results were analyzed using SAS 9.4.
Results: Surveys were completed by all NYS BH (n=124) yielding a 100% response rate. Written policies on TS for both pregnant women and neonates were found in 49% of BHs. Universal TS of pregnant women was noted in 15% of BHs, primarily in Western NYS (54% and Long Island (31%). The majority (85%) of BHs reported some TS of women based on risk criteria which included: history (hx) of substance abuse (73%); observed signs/symptoms of SU during hospitalization (61%); late/no prenatal care (55%) and placental abruption (42%). For confirmed positive maternal TS, most BHs referred to a social work consultation (94%) and/or Child Protective Services (83%). BHs with higher perinatal designation levels referred to more types of services than lower level BHs. Top criteria for initiating neonatal TS included: maternal positive TS results (96%); maternal self reporting of current SU (90%); signs of neonatal withdrawal (92%) and maternal hx of SU (89%). Neonatal TS was most commonly done using urine samples (95%) and meconium samples (48%). Many BHs sent more than one sample type for TS. Umbilical cord samples for TS were used in 4% of BHs.
Conclusions: Wide variation in policies/practices for TS was observed in NYS BHs. Fewer than half of all hospitals had written policies for women and neonates. Western NYS and Long Island had the most BHs using universal maternal TS. These study findings present an opportunity for a statewide initiative to standardize TS in NYS BHs.

Introduction

In the last decade, the incidence of maternal use or dependence on opiates increased more than 5-fold. The annual rate of Neonatal Abstinence Syndrome (NAS) increased exponentially with a greater than 3-fold rise, mirroring the rise in maternal opiate use. There is no clear evidence based practice guidelines. This has led to a wide variation in perinatal maternal and neonatal toxicology screening and reporting practices.

Standardization in screening and reporting practices would identify couplets at risk and provide the best in-hospital and post-discharge care and outcomes. Additional benefits include decrease in practice variation, cost containment and improvement in prenatal substance exposure management.

Objectives

- To identify variation in TS in pregnant women and neonates, by NYS region and BH level of care
- To identify variation in reporting practices for "positive" TS results in both mothers and neonates
- To best practices for TS
- To assess the need for a statewide collaborative on standardization in TS screening/practices

Hypothesis

There is wide variation in TS for mothers and neonates in NYS BHs and an opportunity for standardization exists

Methods

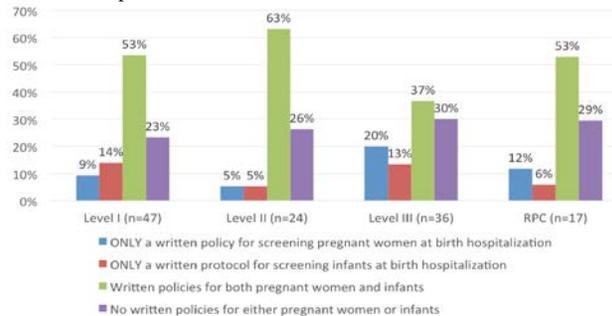
- Electronic survey of all NYS BHs (N=124)
- Responses grouped by region and level of BH
- Only one survey/BH
- Data analyzed using SAS 9.4

Results

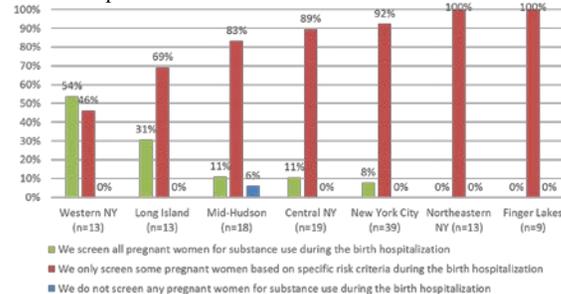
- 100% response rate



Written policies for TS



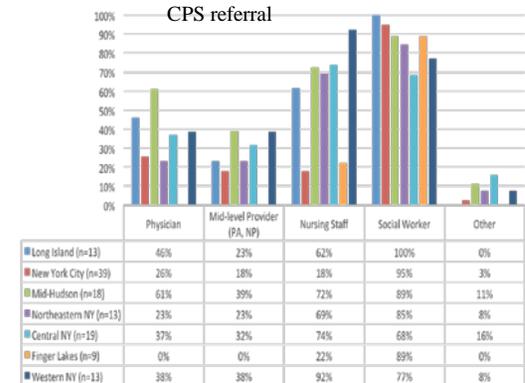
TS practices



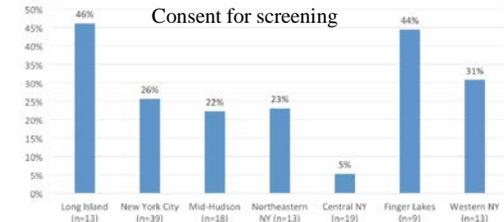
Neonatal Screening Criteria

	Long Island (n=13)	New York City (n=39)	Mid-Hudson (n=18)	Northeastern NY (n=13)	Central NY (n=19)	Finger Lakes (n=9)	Western NY (n=13)
Mother's self-report of current drug use	100%	100%	100%	85%	95%	100%	85%
Mother with a history of drug use	92%	92%	89%	85%	95%	89%	69%
Mother who lacks prenatal care	77%	85%	72%	77%	95%	89%	69%
Mother presents with signs/symptoms of drug use (observed by providers)	85%	100%	89%	77%	95%	100%	69%
Mother with a positive toxicology screen during pregnancy or the postpartum period	92%	100%	89%	100%	100%	100%	85%
Mother presents with placental abruption	77%	59%	22%	69%	63%	67%	77%
Infant presents with signs of drug withdrawal (observed by providers)	92%	100%	94%	85%	84%	100%	77%
Other	31%	5%	11%	15%	32%	11%	23%

CPS referral



Consent for screening



Conclusions

- A wide variation in TS exists in NYS BHs. The variation occurs by region as well as level of BH within NYS
- An opportunity exists for a statewide initiative to standardize TS policies and practices

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