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Standardizing STI Screening in Child Sexual Abuse Cases at the CARES Institute

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Introduction

- Children who are sexually abused have an increased risk of contracting STIs and/or becoming pregnant.¹
- CDC STI testing guidelines should be adhered to in order to provide the safest outcomes for patients.^{2,3}
- Physician compliance to guidelines plays a significant role in ensuring patient safety. Identifying ways to improve physician compliance can enhance patient care.

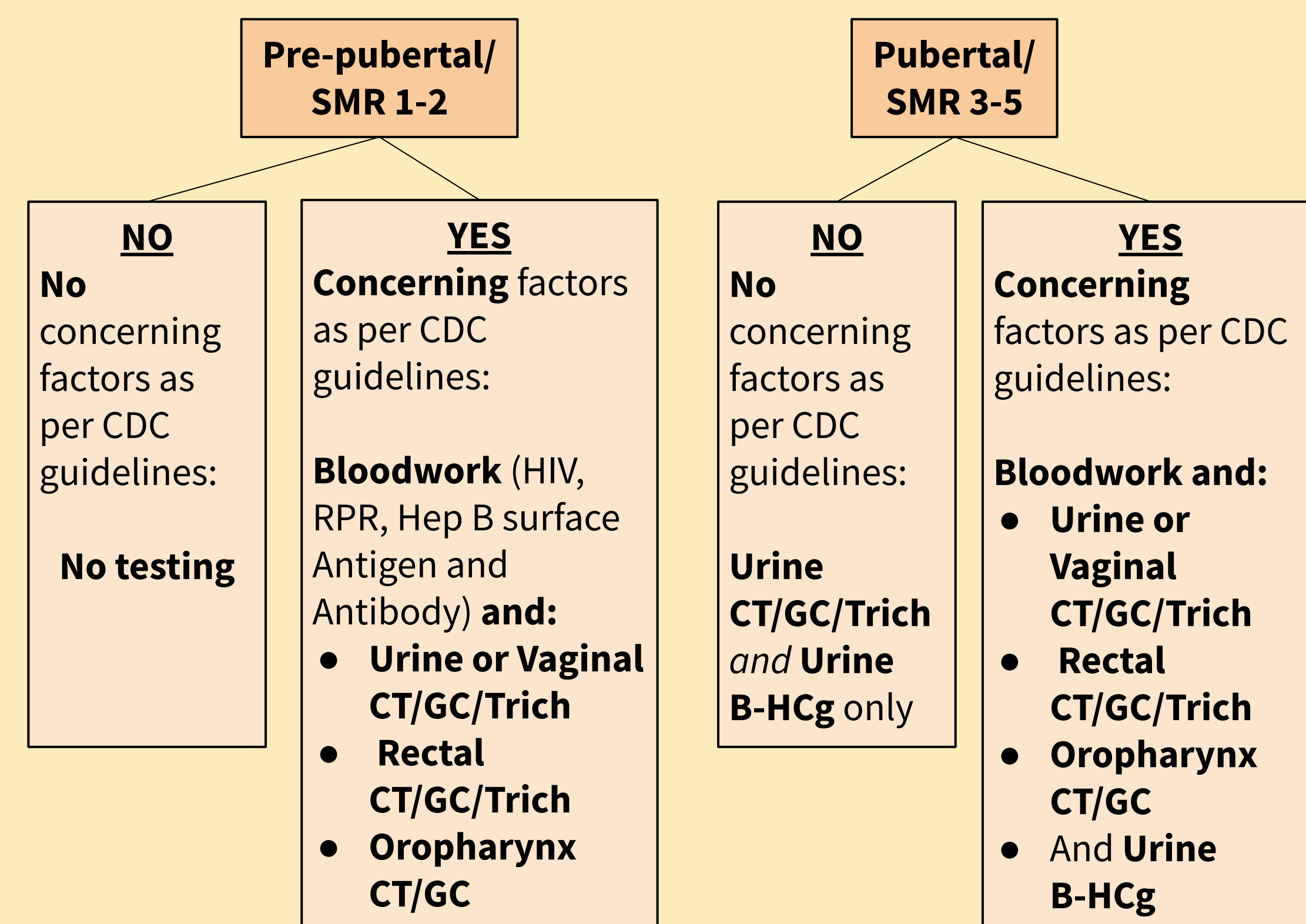
Risk factors²

Risk factors warranting physician orders for STI testing

- Penetration or evidence of recent injury to the genitals, anus, or oropharynx
- Abuse by a stranger or high risk individual
- Having a household member with a STI
- Living in an area with a high STI rate
- Signs/symptoms of STIs
- Request for testing

Current CARES STI testing protocol

- Based on 2021 CDC STI testing guidelines^{2,3}



Purpose

- Measure CARES Institute's **child abuse pediatrician compliance** with the CARES Institute STI testing protocol
- Administer **Continuing Medical Education (CME) trainings** and compare compliance rates before and after their administration

Methods

1. Data including patient risk factors and the status of testing indication, order, and completion was extracted from patient charts and recorded into physical forms, before and after the first CME training session from two time points (Baseline and Phase 1).
2. This data was inputted into an electronic database from which statistical analyses comparing the STI protocol adherence before and after the training session were performed. A second CME training session was administered in 2023 to educate CARES physicians on the findings of the analyses. Data extraction from 2023 patient charts is currently in progress.



Results

- Percent compliance for the urine testing, other STI testing (rectal, oropharyngeal, and bloodwork), and B-HCg testing increased in all three categories from Baseline to Phase I

	Baseline	Phase 1
Sample Size	275	100
Mean Age	8.8	8.5
% Female	62	67

Figure 1. General comparison of Baseline and Phase 1

Test	Percent Compliance	
	Baseline	Phase 1
Urine Group (n=149, p=.02)	41%	62%
Everything Else Group (n=82)	7%	25%
B-HCg (n=84)	42%	70%

Figure 2. Compliance rates of CARES physicians among the urine, other STI (rectal, oropharyngeal, and bloodwork), and B-HCg testing categories

Test	Indicated		Ordered	
	2017 (Baseline)	2021 (Phase I)	2017 (Baseline)	2021 (Phase I)
Urine	103	47	43	31
Rectal	46	36	4	9
Oral	45	35	2	14
HIV	45	35	18	15
Hep B Ab	45	35	15	15
Hep B Ag	45	35	15	15
RPR	45	35	18	15
BHCG	60	24	25	18

Figure 3. Raw data of the amount of indicated and ordered tests by CARES physicians

Conclusion

- The increase in the percent compliance from Baseline to Phase I indicates the potential benefit of physician education to increasing physician adherence to STI testing protocol
- While compliance increased, there is still much progress to be made, indicating the need for further physician education
- Phase II is still in progress
 - Results from the statistical analysis of Phase II charts can be compared to that of Phase I to keep track of compliance
 - Improvements to the current STI testing protocol of the CARES Institute can be made with conclusions from this data and physician feedback from CME training sessions
- **Future**
 - Identify risk factors that are commonly not documented in patient charts
 - Determine ways to improve documentation

Limitations

- Small local sample
 - Results limited to the group of physicians at the CARES institute
- Physician turnover
 - Only physicians present for 2+ phases were included
- Lack of access to prior patient STI testing history

References

1. Girardet RG, Lahoti S, Howard LA, et al. Epidemiology of sexually transmitted infections in suspected child victims of sexual assault. *Pediatrics*. 2009;124(1):79-86.
2. Workowski KA, MD, Bolan, Gail A., MD. Sexually Transmitted Diseases Treatment Guidelines, 2015. *MMWR Recomm Rep*. 2015;64.
3. Workowski KA, MD, Bachman, Laura H., MD, Chan, Philip A., MD, et. al. Sexually Transmitted Infections Treatment Guidelines, 2021. *MMWR Recomm Rep*. 2021;70