



**CenCalHEALTH**<sup>®</sup>  
Local. Quality. Healthcare.



# STI & HIV Prevention & Treatment Training

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2022 Provider Training

# *STI & HIV Prevention & Treatment Training*



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# AGENDA

- **Prevention, Screening & Treatment**

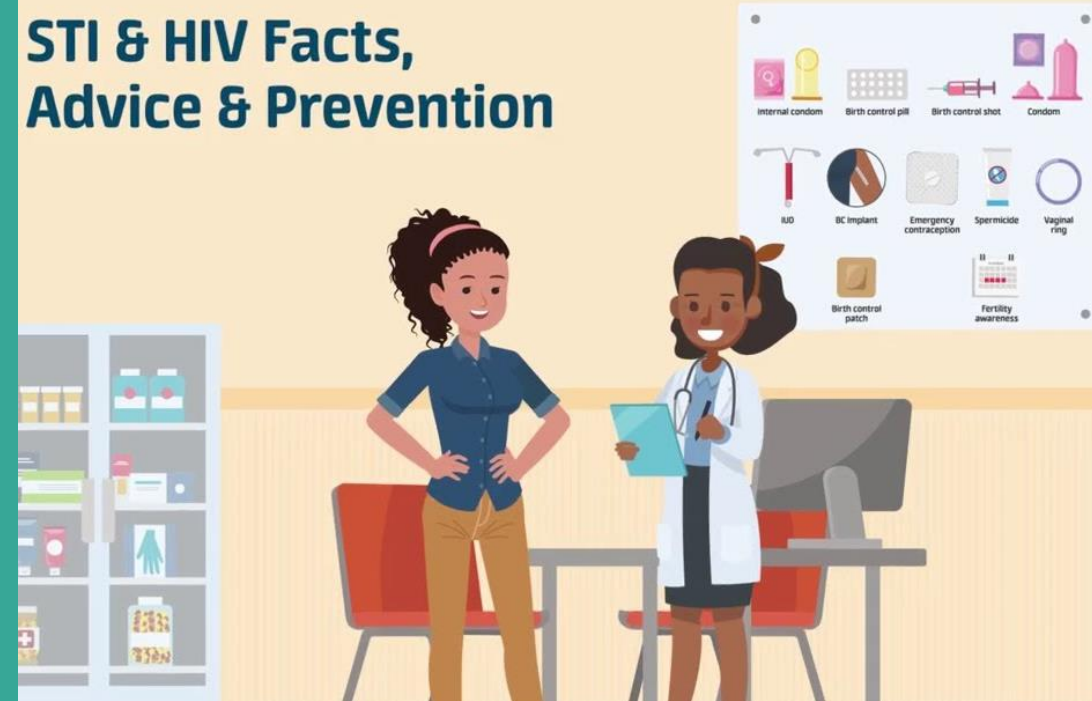
Susan Lawton, M.D., Associate Medical Director  
Santa Barbara Neighborhood Clinics

- **CenCal Health Provider Resources**

Santiago Segovia, Population Health Specialist  
CenCal Health

- **Attendee Q & A**

## STI & HIV Facts, Advice & Prevention



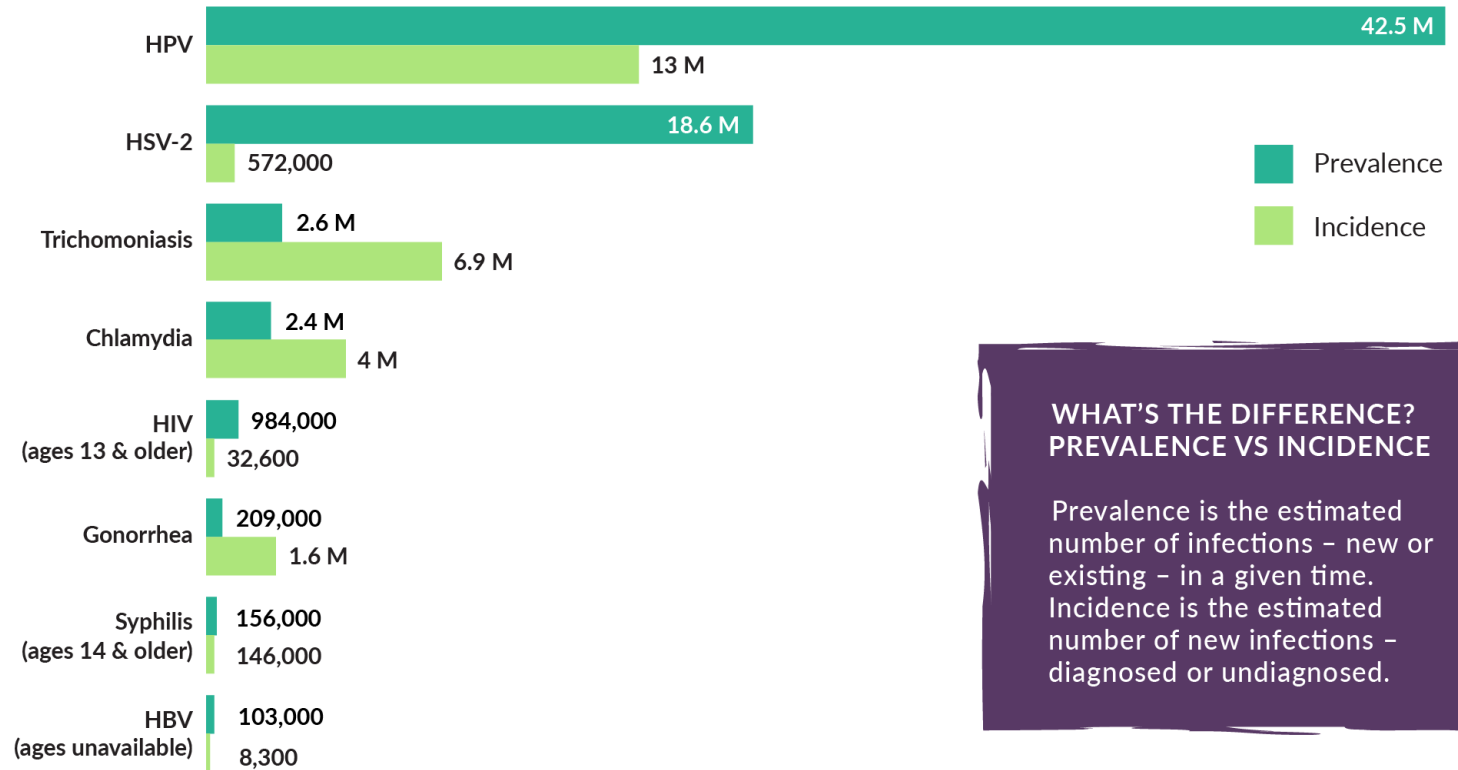
# STIs in 2022 Prevention, Screening and Treatment

Susan Lawton MD

Associate Medical Director /Santa Barbara Neighborhood Clinics

# 2018 CDC National Data on STI Incidence and Prevalence

STI Prevalence and Incidence in the US



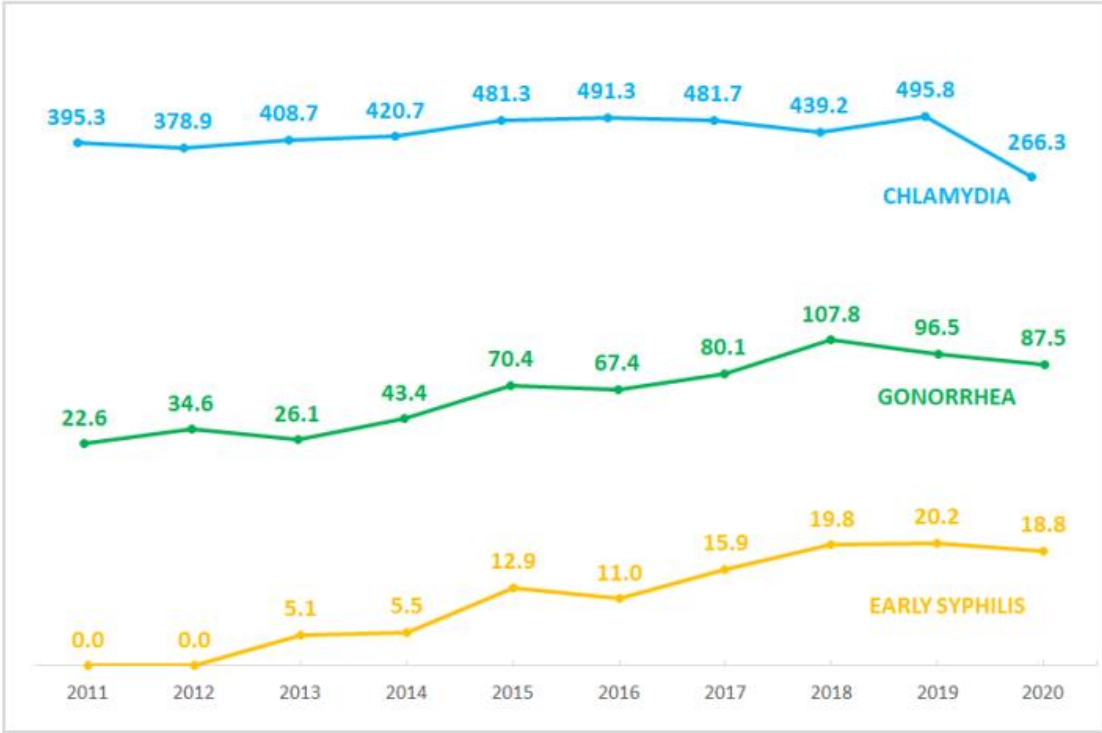
## WHAT'S THE DIFFERENCE? PREVALENCE VS INCIDENCE

Prevalence is the estimated number of infections – new or existing – in a given time. Incidence is the estimated number of new infections – diagnosed or undiagnosed.

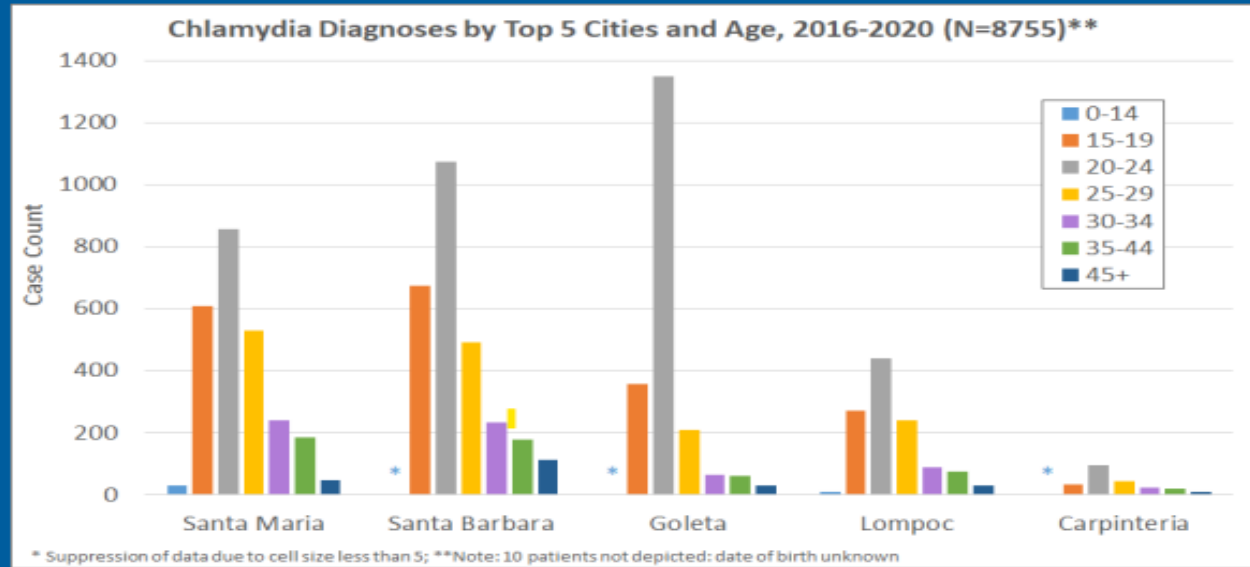
\*Bars are for illustration only; not to scale, due to wide range in number of infections. Estimates for adults and adolescents ages 15+ unless otherwise stated. HIV and HBV data only represent sexually acquired infections.

# Santa Barbara County Trends

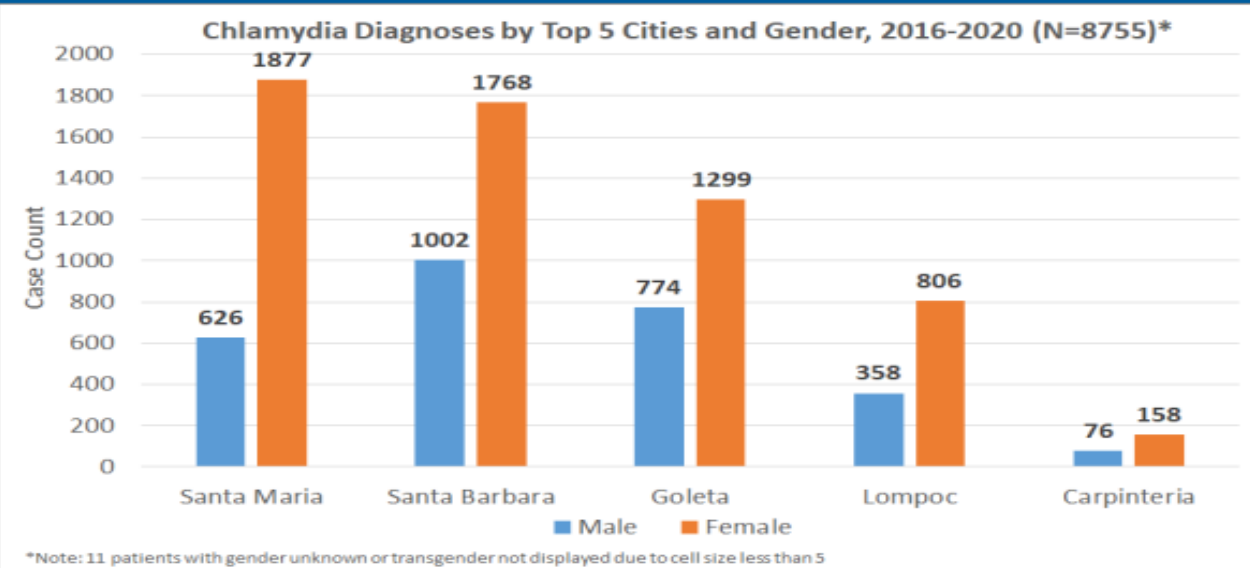
Rates of Selected STIs by Year in SBC, 2011-2020



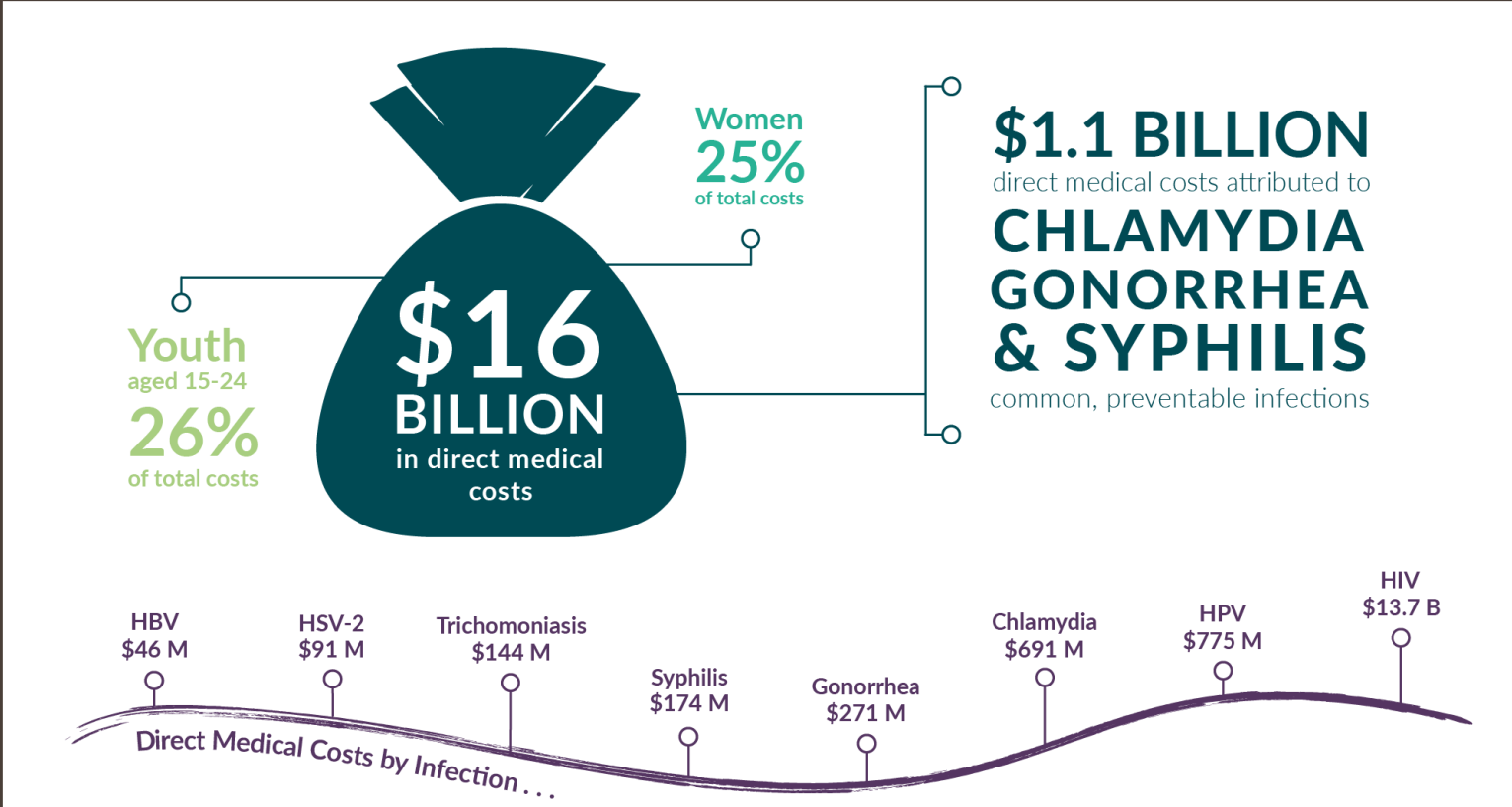
# SB County at risk populations for Chlamydia



In each of the top 5 populated cities of SBC, the age group most likely to be diagnosed with CT was 20-24 years. Females had the highest count of CT diagnoses than other genders. Of note, the proportion of males being diagnosed in Santa Maria was far lower than other cities' gender breakdown, potentially revealing a need for enhanced CT screening and education for men in Santa Maria.



# Cost to the National Health Care System





## Cost Effective Approaches

- **Primary Prevention**- Health Education in homes/ schools/ health care facilities / immunizations before possible exposure (HPV/HepB) / condoms.
- **Screening** – Generally requires the person to come to a health care facility at this point in time. Home testing kits are now available however
- **Treatment**- Cost can be prohibitive
- **Prevention of Recurrent Infections**- may require changes in sexual practices that patients may be unwilling to make.

California  
Coverage for  
STI screening  
and treatment  
at no cost to  
the patient  
who qualifies  
financially.

- **Family Pact**- covers STI screening and treatment in parallel with contraceptive management. NEW- Will be covering HPV vaccination.
- **MediCal**- State funded program covers most screening and treatment in California (referred to as Medicaid in other states)
- **CenCal** –our local Central Coast MediCal HMO

# Populations at Increased Risk for STIs

- Females **age 25 and younger** once sexually active
- Persons with **multiple sex partners**, especially if anonymous
- Men who **have sex with Men**
- Men who have sex with women but present for care in a **high risk** setting ie. Adolescent clinics, correctional facilities, STI specific Clinics and those with a prior CT/GC infection in the prior 24 months.
- **HIV infected** persons with immune dysfunction
- Persons who **use drugs** in conjunction with sex , particularly illicit drugs such as methamphetamines, poppers, or IV drugs
- Persons who **exchange sex for money** or drugs
- **Prior STI infections**, particularly in the last 24 months

## Evaluating Risk

### The 5 (6) P's

- **Partners** (same sex, opposite sex, any gender?)
- **Past STIs** (when and which ones?)
- **Parts**- What body parts do they have, use (remember our Trans patients!)
- **Practices** ie needle sharing or use of drugs during sex practices? Choking?
- **Prevention**- "What do you do to prevent STIs?"
- **Pregnancy** Plans

Primary  
Prevention  
(Requires  
Education)

- Vaccination (HPV, HepB)
- Abstinence
- Reduced Exposure (limit partners)
- Mutual Monogamy
- Barriers (condoms, dental dams, other)

# Preventive Vaccines

- **HPV Vaccine** (Gardasil-9)- active against 9 HPV subtypes – a combination of low risk subtypes (cause anogenital warts- 6,11) and high risk subtypes (cause abnormal cervical, oropharyngeal and anal cytologic changes- 16,18,31,33,45,52,58)
- Indicated for both males and females age 9-14 yo (2dose series) or age 15-45 yo (3 dose series) Now covered by FamPact, CenCal, VFA
- **HBV Vaccine**- Advised to start as newborn and catchup any persons previously unvaccinated until age 59 routinely and over 60 yo based on other risks. (CDC and ACIP)

# HIV Prevention options- PrEP Pre Exposure Prophylaxis

- Evaluate Risk, but offer to ALL sexually active persons (Allow them to evaluate risk)
- Pretest- HIV antigen/antibody test , baseline Creatinine, wt. and lipids if going to use Descovy, review medications: (Regular NSAID use contraindicated with Truvada; Some anti-seizure meds, TB meds and St Johns wort contraindicated with Descovy)
- Ongoing testing- q 3 months HIV test must be negative before refill of oral meds or q 2 months for injectable Apretude
- Continue screening for other STIs as per risk
- 99% effective when taken as prescribed to prevent sexually transmitted HIV

## “On demand” use of PrEP

- Consider for those persons with intermittent, at risk, sex
- 2-1-1 schedule: take 2 pills (Truvada only) 2-24 hours before sex, the 1 pill qd x 2, taken 24 hours after the first dose OR if repeated sex, then cont 1 pill per day until 2 days after the last sexual activity
- Data unclear on effectiveness for vaginal receptive sex ,persons who inject drugs and transgender people.
- Not yet FDA approved or CDC recommended although the International AIDS Society in the USA and the San Francisco Dept of Public Health endorse the approach



# HIV Prevention PEP Post Exposure Prophylaxis

- Consider highly effective PEP if the patient has had an exposure to a positive HIV partner or concerns of exposure. (Condom breaks, sexual assault, etc.)
- Must be taken within 72 hours of exposure and continue for 28 days
- Pretreatment tests- HIV ag/ab (ideally 4<sup>th</sup> generation), rapid HIV ok but f/u w 4<sup>th</sup> gen when available, UPT prn, sCr, AST/ALT and any other indicated STI tests
- Options: 1- Truvada (tenofovir disoproxil fumarate (TDF)/emtricitabine (FTC) 300/200) + Tivicay (dolutegravir) 50 mg x 28d. (not if sCR<60)
  - 2- Biktarvy= Descovy (tenovir alafenamide 25 mg/emtricitabine 200 mg) + bictegravir 50 mg x 28 d.
- Side Effects: mild (nausea) usually tolerable

# Where to obtain samples?

- Test **EVERY body part** the persons **uses** in their sexual practices.
- Remember Trans-women may have penises, and Trans-men will have vaginas (unless they have undergone “bottom” surgery.
- Test the body parts the patient has... not what they might look like they have!

# MSM and Rectal GC/CT

- <https://www.ncbi.nlm.nih.gov/entrez/eutils/elink.fcgi?dbfrom=pubmed&retmode=ref&cmd=prlinks&id=23677015>
- MSM or (penile to anal sex):
- Rectal GC rates of up to 38% and CT 24 % (easily missed if no rectal sample collected)
- VS MSW and Women rates for rectal GC on average are 0.24% and CT 2.2%

# Extragenital STIs in females

- [https://journals.lww.com/stdjournal/Fulltext/2015/05000/Neisseria\\_gonorrhoeae\\_and\\_Chlamydia\\_trachomatis.1.aspx](https://journals.lww.com/stdjournal/Fulltext/2015/05000/Neisseria_gonorrhoeae_and_Chlamydia_trachomatis.1.aspx)
- 20-40% of GC and 10-25% of CT would be missed in “females” if no extragenital testing is done (oral/ rectal as indicated)

# California STI Screening Recs for HIV negative Bio females and Transmen

- Sexually active persons with a vagina-**until age 24-**
  1. HIV screening once / lifetime and THEN as per risk.
  2. Annual CT and GC routinely AND as per risk.
  3. Hepatitis C antibody with reflex screen starting age 18.
  4. Pap smear without HPV
  5. Others as per risk i.e. Syphilis
- Sexually active persons with a vagina- **age 25 and older-**
  1. HIV, Hep C and other STI screening as per risk evaluation
  2. Pap smear with reflex to HPV until age 30 then Cotest

# HIV positive- Bio females and Transmen

## Annual screenings:

- CT/GC- vaginal, cervical, urine
- CT/GC- rectal ( if indicated)
- GC +/-CT- pharyngeal ( if indicated)
- Syphilis
- Trichomoniasis (NAAT)
- . At least once/lifetime and then prn- HepBsAg and HepCab w reflex

## CDPH 2015

- Pap smears- start at age 21. q6-12 months x 3 years then q 3 years if negative. Over age 30 cotest. If HPV negative can cotest q 3 years

[https://www.uptodate.com/contents/screening-for-cervical-cancer-in-patients-with-hiv-infection-and-other-immunocompromised-states?topicRef=7575&source=see\\_link](https://www.uptodate.com/contents/screening-for-cervical-cancer-in-patients-with-hiv-infection-and-other-immunocompromised-states?topicRef=7575&source=see_link)

# Screenings for Pregnant Patients

- **First Prenatal Visit**

(regardless of gestational age at presentation)

- HIV
- Syphilis\*\*
- Chlamydia (CT)<sup>2</sup>
- Gonorrhea (GC)<sup>2</sup>
- Hepatitis B surface antigen (HBsAg)
- Hepatitis C (HCV) antibody<sup>2</sup> with reflex HCV RNA viral load if HCV antibody positive
- Type-specific Herpes Simplex Virus (HSV) serology NOT routinely recommended<sup>4</sup>
- Cervical cancer screening if age  $\geq 21$  years and indicated by national guidelines<sup>5</sup>

- **Third Trimester**

(assuming first prenatal visit has already occurred; if not, see screening recommendations above)

- HIV if high risk<sup>6</sup>
- Syphilis (ideally between 28-32 weeks gestation)<sup>7\*\*</sup> repeated due to increased incident of congenital syphilis
- CT and GC if age <25 years, positive test earlier in pregnancy, or if at an increased risk<sup>2</sup>

- **During Labor & Delivery**

- HIV antigen/antibody combination test with results within the hour if HIV status undocumented
- Syphilis, unless low risk<sup>8</sup> AND a documented negative screen in the third trimester
- HBsAG on admission if no prior screening or if at an increased risk<sup>9</sup>

-

# Screening Recs for Bio Males and Trans Women who have sex with Bio Females (not MSM)

- HIV and Hep C screening once in a lifetime and then prn risk
- Targeted Screening for CT in high risk settings/ or if risk fac



## MSM (penile to anal/oral / genital sex)

Annual screening for:

- CT/GC urine/ penile
- CT/GC rectal (if indicated- Anal Receptive intercourse)
- CG pharyngeal (if indicated)
- Syphilis
- HIV
- Hepatitis C by HCVab reflex at least once and prn risk
- HepBsAg- and HepBsab or vaccination

# Anal Cancer Screening for HIV Positive persons who are anally receptive partners.

- <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6966611/>
- There are no current National Recommendations for Anal Cancer screening although multiple groups recommend some screening.
- Frequency of screening by anal cytology and HPV testing is variable.
- HPV prevalence very high in this population (up to 92.6%) so not very helpful in indicating increased risk for anal cancer.
- Most recommend annual cytology (+/- HPV testing) with anal cytology for ASCUS or higher findings.

Treatment  
resource  
California Dept  
Public Health

- <https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/California-STI-Treatment-Guidelines.aspx#CT>

# Chlamydia Treatment

Scenario	Recommended Regimens	Alternative Regimens
Urogenital/Rectal/Pharyngeal Infections	Doxycycline <sup>1</sup> 100 mg po bid x 7 d	•Azithromycin 1 g po x 1 dose <b>OR</b> •Levofloxacin 500 mg po once daily x 7 d
Pregnant Patients <sup>2</sup>	Azithromycin 1 g po x 1 dose	Amoxicillin 500 mg po tid x 7 d

# Gonorrhoea Treatment

Scenario	Recommended Regimens	Alternative Regimens
Urogenital/Rectal Infections <sup>3</sup>	<ul style="list-style-type: none"> <li>•Ceftriaxone 500 mg IM x 1 dose for persons weighing &lt;150kg<sup>4</sup> <b>OR</b></li> <li>•Ceftriaxone 1 g IM x 1 dose for persons weighing ≥ 150kg</li> </ul>	<ul style="list-style-type: none"> <li>•If cephalosporin allergy: dual therapy with Gentamicin<sup>1</sup> 240 mg IM x 1 dose <b>PLUS</b> Azithromycin 2 g po x 1 dose</li> <li>If ceftriaxone not available or feasible, but no allergy concerns:                             <ul style="list-style-type: none"> <li>•Cefixime 800mg x 1 dose<sup>5</sup></li> </ul> </li> </ul>
Pharyngeal Infections <sup>3,6</sup>	<ul style="list-style-type: none"> <li>•Ceftriaxone 500 mg IM x 1 dose for persons weighing &lt;150kg<sup>4</sup> <b>OR</b></li> <li>•Ceftriaxone 1 g IM x 1 dose for persons weighing ≥ 150kg</li> </ul>	No reliable treatment alternatives. Consult an infectious disease specialist or submit a question online at <a href="http://www.stdccn.org">www.stdccn.org</a> .

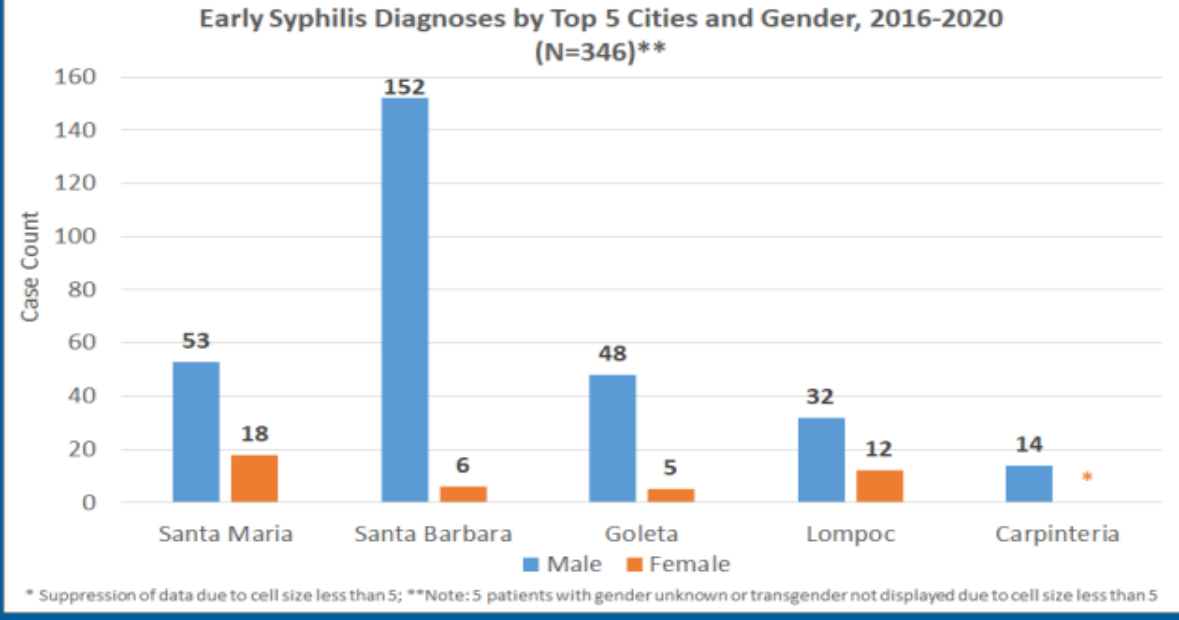
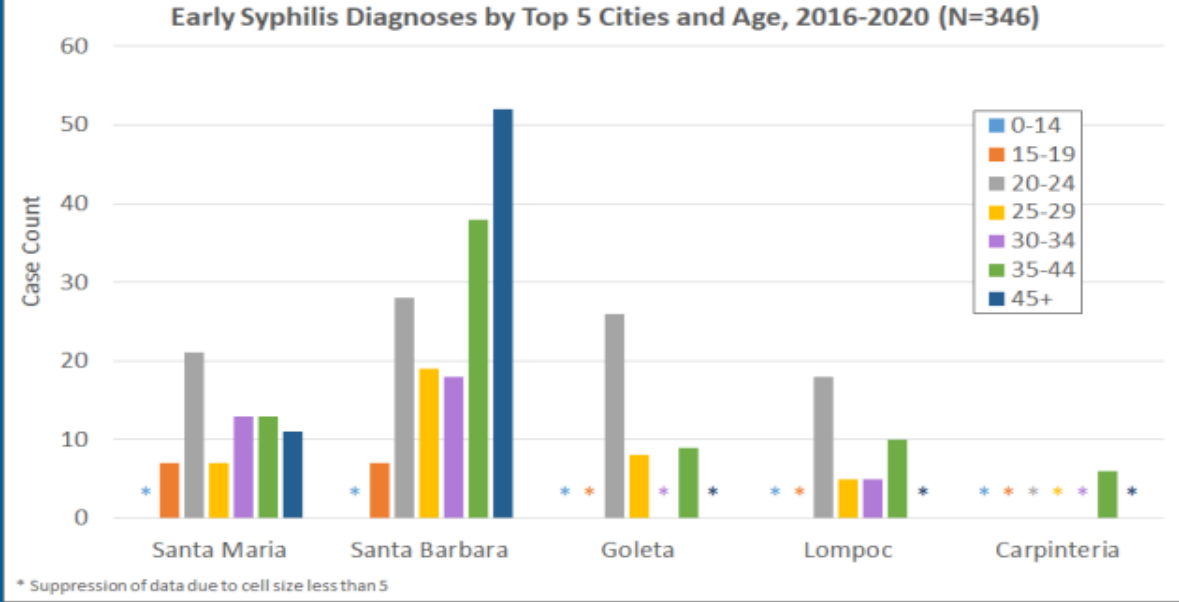
# Trichomoniasis Treatment

Scenario	Recommended Regimens	Alternative Regimens
Cervicovaginal infection	Metronidazole 500 mg po bid x 7 d	•Tinidazole <sup>14</sup> 2 g po x 1 dose <b>OR</b> •Secnidazole <sup>15</sup> 2 g po x 1 dose
Penile infection	Metronidazole 2 g po x 1 dose	•Tinidazole <sup>14</sup> 2 g po x 1 dose <b>OR</b> •Secnidazole <sup>15</sup> 2 g po x 1 dose

# Herpes Treatment

First Clinical Episode of Herpes	<ul style="list-style-type: none"><li>• Acyclovir 400 mg po tid x 7-10 d OR</li><li>• Valacyclovir 1 g po bid x 7-10 d OR</li><li>• Famciclovir 250 mg po tid x 7-10 d</li></ul>
Episodic Therapy for Recurrences (If no HIV co-infection)	<ul style="list-style-type: none"><li>• Acyclovir 800 mg po bid x 5 d OR</li><li>• Acyclovir 800 mg po tid x 2 d OR</li><li>• Valacyclovir 500 mg po bid x 3 d OR</li><li>• Valacyclovir 1 g po daily x 5 d OR</li><li>• Famciclovir 1 gm po bid x 1 d OR</li><li>• Famciclovir 500 mg po once, then 250 mg po bid x 2 d OR</li><li>• Famciclovir 125 mg po bid x 5 d</li></ul>
Episodic Therapy for Recurrences (If no HIV co-infection)	<ul style="list-style-type: none"><li>• Acyclovir 800 mg po bid x 5 d OR</li><li>• Acyclovir 800 mg po tid x 2 d OR</li><li>• Valacyclovir 500 mg po bid x 3 d OR</li><li>• Valacyclovir 1 g po daily x 5 d OR</li><li>• Famciclovir 1 gm po bid x 1 d OR</li><li>• Famciclovir 500 mg po once, then 250 mg po bid x 2 d OR</li><li>• Famciclovir 125 mg po bid x 5 d</li></ul>

# Syphilis data in Santa Barbara County





# Syphilis Treatment

Scenario	Recommended Regimens	Alternative Regimens
Primary, Secondary, and Early Latent	Benzathine penicillin G 2.4 million units IM x 1 dose	<ul style="list-style-type: none"> <li>• Doxycycline<sup>27</sup> 100 mg po bid x 14 d OR</li> <li>• Tetracycline<sup>27</sup> 500 mg po qid x 14 d OR</li> <li>• Ceftriaxone<sup>27</sup> 1 g IM or IV daily x 10-14 d</li> </ul>
Late Latent or Syphilis of Unknown Duration OR Tertiary Syphilis with normal CSF	Benzathine penicillin G 7.2 million units total, administered as 3 doses of 2.4 million units IM each at 1 week intervals <sup>28</sup>	<ul style="list-style-type: none"> <li>• Doxycycline<sup>27</sup> 100 mg po bid x 28 d OR</li> <li>• Tetracycline<sup>27</sup> 500 mg po qid x 28 d</li> </ul>
Neurosyphilis and Ocular Syphilis <sup>29</sup>	Aqueous crystalline penicillin G 18-24 million units daily, administered as 3-4 million units IV q 4 hrs or as continuous infusion x 10-14 d	<ul style="list-style-type: none"> <li>• Procaine penicillin G 2.4 million units IM daily x 10-14 d PLUS Probenecid 500 mg po qid x 10-14 d</li> </ul> <p>OR, in the setting of severe penicillin allergy</p> <ul style="list-style-type: none"> <li>• Ceftriaxone<sup>27</sup> 1-2 gm IM or IV daily x 10-14 d</li> </ul>

# Your County STI resource

- STI consultations- 510-620-3440
- Disease control 805-681-5280

# Anogenital Wart Treatments

Scenario	Recommended Regimens	Alternative Regimens*
External Genital/Perianal Warts	<p>Patient-Applied</p> <ul style="list-style-type: none"> <li>• Imiquimod<sup>18,19</sup> 5% cream topically qhs 3x/wk up to 16 wks OR</li> <li>• Imiquimod<sup>18,19</sup> 3.75% cream topically qhs for up to 8 wks OR</li> <li>• Podofilox 0.5% solution or gel topically bid x 3 d then 4 d off, repeat up to 4 cycles OR</li> <li>• Sinecatechins<sup>18</sup> 15% ointment topically tid for up to 16 wks</li> </ul> <p>Provider-Administered</p> <ul style="list-style-type: none"> <li>• Cryotherapy with liquid nitrogen, apply once q 1-2 weeks OR</li> <li>• Trichloroacetic acid (TCA) 80-90%, apply once q 1-2 wks OR</li> <li>• Bichloroacetic acid (BCA) 80-90%, apply once q 1-2 wks OR</li> <li>• Surgical removal</li> </ul>	<p>Provider-Administered</p> <ul style="list-style-type: none"> <li>• Podophyllin resin<sup>20</sup> 10-25% in tincture of benzoin, applied weekly PRN OR</li> <li>• Intralesional interferon OR</li> <li>• Photodynamic therapy OR</li> <li>• Topical cidofovir</li> </ul>
Mucosal Genital Warts	<p>Urethral meatus, Vaginal, Cervical, Intra-Anal</p> <ul style="list-style-type: none"> <li>• Cryotherapy<sup>21</sup> with liquid nitrogen OR</li> <li>• Surgical removal OR</li> </ul> <p>Vaginal, Cervical, Intra-Anal</p> <ul style="list-style-type: none"> <li>• TCA or BCA 80-90%</li> </ul>	

# Choking in Sex Encounters in 2022

- Not an infection but definitely a health risk.
- In 18-30 yo person:
  - 58% of women have been “choked” at least once, with 34% > 5 times
- VS Males at 8% once and 6% more than 5 times.
  
- <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC9201570/>

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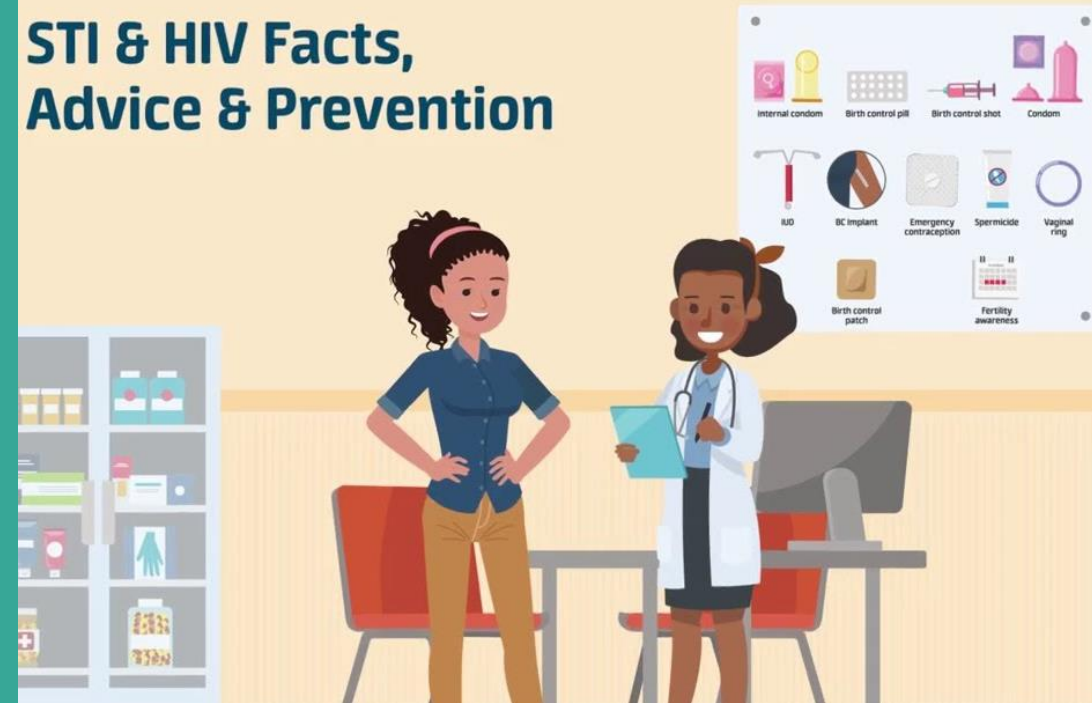
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## STI & HIV Facts, Advice & Prevention



# Provider QCIP Program Measure

## Women's Health Priority Measures

- Chlamydia Screening in Women: the number of women ages 16-24 who are sexually active and have been screened for chlamydia in the last 12 months

**Provider Login** 



Category	Measure	Members in Measure	Compliant Members	Non Compliant Members	Rate
Women's Health	Breast Cancer Screening	18	12	6	66.67%
	Cervical Cancer Screening	51	35	16	68.63%
	Chlamydia Screening in Women	8	3	5	37.50%
	Women's Health - Summary	77	50	27	64.94%

Quality Care Incentive Program

Dashboard Quality Care Incentive Program (QCIP)

Financial Overview

Performance Overview



# Provider QCIP Program Measure

## Women's Health Priority Measures

- Chlamydia Screening in Women: the number of women ages 16-24 who are sexually active and have been screened for chlamydia in the last 12 months



### Quality Care Incentive Program (QCIP) Performance - Member Detail

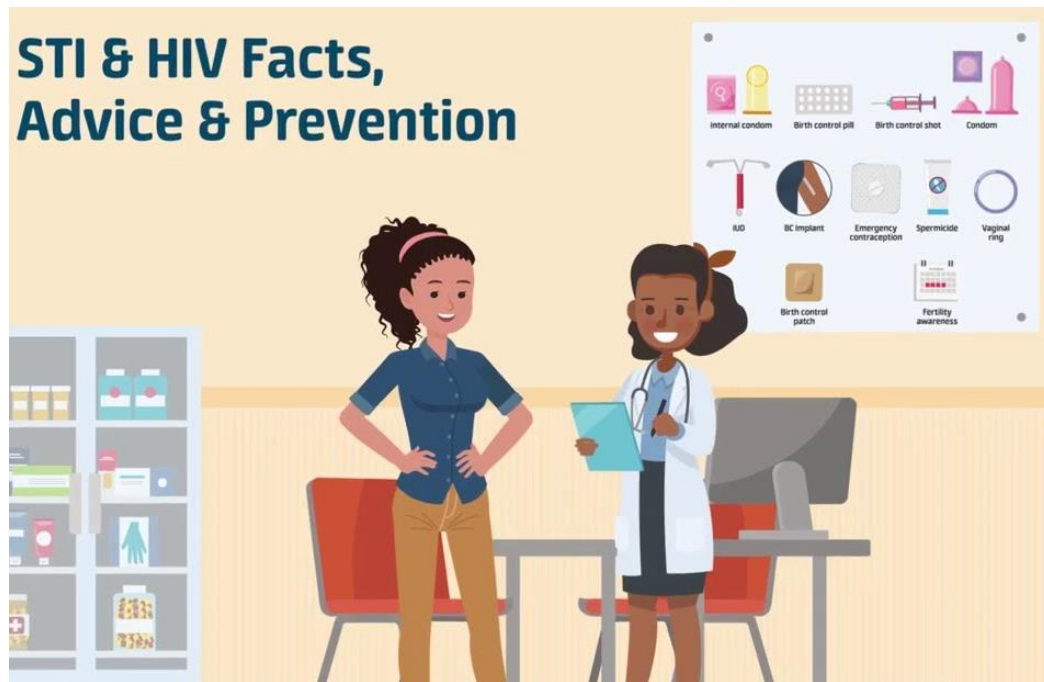
Date Range: Jun 01, 2022 thru Jun 30, 2022 | Non-Compliant Member Detail | Medi-Cal SB

PCP NAME	Member ID	Member Name	Date of Birth	Age	Gender	Home Phone	Category	Measure Name
				19	Female		Women's Health	Chlamydia Screening in Women
				21	Female		Women's Health	Chlamydia Screening in Women
				19	Female		Women's Health	Chlamydia Screening in Women
				24	Female		Women's Health	Chlamydia Screening in Women
				18	Female		Women's Health	Chlamydia Screening in Women



[www.cencalhealth.org/providers/quality-of-care/quality-care-incentive-program/](http://www.cencalhealth.org/providers/quality-of-care/quality-care-incentive-program/)

# Provider Resources



- **STI Treatment Recommendations**  
[California STI Treatment Guidelines for Adults and Adolescents](#)
- **STI Treatment Recommendations in Pregnancy**  
[California STI Treatment Guidelines for Pregnancy](#)
- **[Clinical Interpretation of Syphilis Screening Algorithm](#)**
- **Free STI/HIV Testing Resources**  
[Get Tested | National HIV, STD, and Hepatitis Testing \(cdc.gov\)](#)
- **Santa Barbara County Public Health Department**  
[Epidemiology Data Reports](#)



# Important Updates:

- Behavioral Health ABA Referral Requests

<https://www.cencalhealth.org/providers/behavioral-health-treatment-and-mental-health-services/primary-care-provider-screening-tools-and-resources/>

- Medically Tailored Meal Service

<https://www.cencalhealth.org/providers/calaim/>





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