CLINICAL PEARL

• **COVID-19 and pregnancy:** The Centers for Disease Control (CDC) recently released two *Morbidity and Mortality Weekly Reports (MMWRs)* about pregnant women and COVID-19. Findings from two new CDC studies underscore the importance of counseling pregnant women about their risk for severe COVID-19 illness, the potential risk of preterm birth as well as the need to follow key mitigation measures to reduce the risk of acquiring COVID-19 during pregnancy.

  o The first study "Update: Characteristics of Symptomatic Women of Reproductive Age with Laboratory-Confirmed SARS-CoV-2 Infection by Pregnancy Status—United States, January 22–October 3, 2020," found that pregnant women with COVID-19 are at increased risk for severe illness, compared with non-pregnant women with COVID-19. Markers for severe illness included admission to an intensive care unit, need for invasive ventilation and/or extracorporeal membrane oxygenation (ECMO, an advanced life support technique used for patients with life-threatening heart and/or lung problems), and death. Although the absolute risks of severe illness are low overall, pregnant women are at increased risk compared with nonpregnant women with COVID-19, and risk of severe outcomes were highest among women in the oldest age group (ages 35 – 44). Hispanic or Black women were found to be disproportionately affected by COVID-19 during pregnancy. Further, pregnant Hispanic women were more likely to die compared to nonpregnant women relative to other subgroups, and non-Hispanic Black women were disproportionately represented in the total number of deaths among women with COVID-19, regardless of pregnancy status.

  o The second study "Birth and Infant Outcomes Following Laboratory-Confirmed SARS-CoV-2 Infection in Pregnancy—SET-NET, 16 Jurisdictions, March 29–October 14, 2020," found that pregnant women with COVID-19 may be at increased risk of having a preterm infant (born before 37 weeks), which may lead to serious health problems for the infant. Infants born to mothers with COVID-19 during pregnancy were rarely found to have positive COVID-19 test results, and those who did have a positive test result were primarily born to mothers who had COVID-19 within one week of delivery.

PUBLIC HEALTH UPDATES

• San Mateo County Health Officer issued the following revised orders:
  o **Home Isolation Order** directing individuals in the county with COVID-19 to isolate themselves
  o **Home Quarantine Order** directing individuals in the county who are close contacts of individuals with COVID-19 to quarantine themselves
  o **Long Term Care Facilities Order** allowing necessary indoor visitation and limited outdoor and indoor visitation under certain required preconditions

GUIDANCE/GUIDELINES


RESOURCES

COVID-19 Digest Issue 28

- IDSA Podcast: Seven Months into COVID-19: Where Are We Now?
- Connecting with the Experts - COVID-19 Town Hall session: “COVID-19 and Kids: What’s the latest” (AAP)
- PRIME Education Podcast series: HIV and COVID-19: What to Do When an Epidemic Meets a Pandemic

ACADEMIC/RESEARCH PAPERS

- **Nature Microbiology**
  - Longitudinal observation and decline of neutralizing antibody responses in the three months following SARS-CoV-2 infection in humans

- **Science**
  - Robust neutralizing antibodies to SARS-CoV-2 infection persist for months

- **European Journal of Immunology**
  - Seroprevalence of anti-SARS-CoV-2 antibodies in COVID-19 patients and healthy volunteers up to six months post disease onset

- **The Journal of Clinical Investigation**
  - Sex, age, and hospitalization drive antibody responses in a COVID-19 convalescent plasma donor population

- **Cell**
  - Public health antibody screening indicates a six-fold higher SARS-CoV-2 exposure rate than reported cases in children

- **New England Journal of Medicine**
  - SARS-CoV-2 Neutralizing Antibody LY-CoV555 in Outpatients with Covid-19
  - Efficacy of Tocilizumab in Patients Hospitalized with Covid-19

- **Cochrane Systematic Review**
  - Convalescent plasma or hyperimmune immunoglobulin for people with COVID-19: a living systematic review

- **medRxiv**
  - SARS-CoV-2 sequencing reveals rapid transmission from college student clusters resulting in morbidity and deaths in vulnerable populations
  - Broadly-targeted autoreactivity is common in severe SARS-CoV-2 Infection
  - Persistent symptoms after Covid-19: qualitative study of 114 “long Covid” patients and draft quality criteria for services

- **Emerging Infectious Diseases**
  - Cellular Immunity in COVID-19 Convalescents with PCR-Confirmed Infection but with Undetectable SARS-CoV-2–Specific IgG
  - Social Distancing and Artful Pandemic Survival
  - Early Insights from Statistical and Mathematical Modeling of Key Epidemiologic Parameters of COVID-19

- **American Society for Microbiology**
  - Molecular Architecture of Early Dissemination and Massive Second Wave of the SARS-CoV-2 Virus in a Major Metropolitan Area

- **U.S. PIRG**
  - NURSING HOME SAFETY DURING COVID: PPE SHORTAGES
COVID-19 Digest Issue 28

- **JAMA**
  - COVID-19 Test Result Turnaround Time for Residents and Staff in US Nursing Homes
  - Comparative Performance of Private Equity–Owned US Nursing Homes During the COVID-19 Pandemic
  - Peripheral Oxygen Saturation in Older Persons Wearing Nonmedical Face Masks in Community Settings
  - Hospital Volumes of 5 Medical Emergencies in the COVID-19 Pandemic in 2 US Medical Centers
  - Preventing the Spread of SARS-CoV-2 With Masks and Other “Low-tech” Interventions
  - Answering Key Questions About COVID-19 Vaccines
  - Factors Associated With Mental Health Disorders Among University Students in France Confined During the COVID-19 Pandemic

- **BMJ Journal**
  - Association between SARS-CoV-2 infection, exposure risk and mental health among a cohort of essential retail workers in the USA
  - Risk of hospital admission with coronavirus disease 2019 in healthcare workers and their households: nationwide linkage cohort study

- **SSRN**
  - The Effects of Large Group Meetings on the Spread of COVID-19: The Case of Trump Rallies

- **Vanderbilt University School of Medicine**
  - COVID-19 Trends in Tennessee: Summer turns to Fall

- **Open Forum Infectious Diseases**
  - Risk factors for SARS-CoV-2 infection in homeless shelters in Chicago, Illinois – March-May, 2020

- **The Lancet**
  - Associations of type 1 and type 2 diabetes with COVID-19-related mortality in England: a whole-population study
  - Risk factors for COVID-19-related mortality in people with type 1 and type 2 diabetes in England: a population-based cohort study
  - Residential context and COVID-19 mortality among adults aged 70 years and older in Stockholm: a population-based, observational study using individual-level data

- **American Journal of Perinatology**

- **Pediatrics**
  - COVID-19 and Parent-Child Psychological Well-being

- **The Journal of Allergy and Clinical Immunology**
  - Factors associated with adverse COVID-19 outcomes in patients with psoriasis – insights from a global registry-based study

- **Nature Medicine**
  - Wearable sensor data and self-reported symptoms for COVID-19 detection

- **Respiratory Research**
  - The effect of vascular risk factor burden on the severity of COVID-19 illness, a retrospective cohort study

- **Journal of the American College of Cardiology**
  - Characterization of Myocardial Injury in Patients With COVID-19
  - Registry of Arterial and Venous Thromboembolic Complications in Patients With COVID-19

- **Cardiovascular Pathology**
  - Myocarditis is rare in COVID-19 autopsies: cardiovascular findings across 277 postmortem examinations
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- **Cardiovascular Research**
  - Regional and global contributions of air pollution to risk of death from COVID-19

- **International Journal of Indoor Environment and Health**
  - Reducing aerosol transmission of SARS-CoV-2 in hospital elevators

- **Physics of Fluids**
  - Aerosol persistence in relation to possible transmission of SARS-CoV-2

- **mSphere**
  - Effectiveness of Face Masks in Preventing Airborne Transmission of SARS-CoV-2

- **Journal of Travel Medicine**
  - In-flight transmission of SARS-CoV-2: a review of the attack rates and available data on the efficacy of face masks

- **Eurosurveillance**
  - A large national outbreak of COVID-19 linked to air travel, Ireland, summer 2020

- **Harvard T.H. Chan School of Public Health/ Aviation Public Health Initiative**
  - Assessment of Risks of SARS-CoV-2 Transmission during Air Travel and Non-Pharmaceutical Interventions to Reduce Risk Phase One Report: Gate-to-Gate Travel Onboard Aircraft

- **Microbes and Infection**
  - Anti-science extremism in America: escalating and globalizing

**MMWR**

- Birth and Infant Outcomes Following Laboratory-Confirmed SARS-CoV-2 Infection in Pregnancy — SET-NET, 16 Jurisdictions, March 29–October 14, 2020
- Update: Characteristics of Symptomatic Women of Reproductive Age with Laboratory-Confirmed SARS-CoV-2 Infection by Pregnancy Status — United States, January 22–October 3, 2020
- Transmission of SARS-COV-2 Infections in Households — Tennessee and Wisconsin, April–September 2020
- COVID-19 Outbreak at an Overnight Summer School Retreat — Wisconsin, July–August 2020

**HOT OFF THE (LAY) PRESS**

- **USA Today**
  - There's no way to sugarcoat it: COVID-19 cases are surging; one American dies every 107 seconds
  - Doctors: Trump is wrong to accuse medical professionals of profiting from diagnosing COVID-19
  - Trump’s campaign made stops nationwide. Coronavirus cases surged in his wake in at least five places.

- **CNN**
  - Many counties that hosted Trump rallies had a significant increase in Covid-19 cases
  - Flying can be safer than grocery shopping, Harvard study asserts

- **Center for Infectious Disease Research and Policy News**
  - Some areas in US, Europe battle dogged COVID-19 spread

- **The Hill**
  - Trump administration testing czar: Rise in cases is 'real,' not just from more testing

- **AP News**
  - WHO: Europe now has more than 10 million COVID-19 cases
  - Medicare finalizing coverage policy for coronavirus vaccine
The New York Times
- The U.S. has surpassed nine million coronavirus cases, with infections rising in 42 states, as the nation struggles to contain a third surge.
- The United States set another single-day record for new coronavirus cases, surpassing the previous record set last Friday.
- United States Records Its Worst Week Yet for Virus Cases
- Dr. Deborah Birx, a top White House coronavirus adviser, privately warned officials of a new, “deadly” phase, directly contradicting the president.
- With U.S. coronavirus cases mounting, Thanksgiving could be an ‘inflection point.’
- Death Rates Have Dropped for Seriously Ill Covid Patients
- States Undercount Positive Rapid Tests, Masking the Spread of Disease
- How Are Americans Catching the Virus? Increasingly, ‘They Have No Idea’
- Will the Hardest-Hit Communities Get the Coronavirus Vaccine?
- The Trump Administration Shut a Vaccine Safety Office Last Year. What’s the Plan Now?
- ‘A Slow Killer’: Nursing Home Residents Wither in Isolation Forced by the Virus
- Acute HIV Cases Double in ED. Is COVID-19 Responsible?
- People Are Still Having Sex. So Why Are S.T.D. Rates Dropping?
- Wedding and Birthday Party Infect 56, Leaving Nearly 300 in Quarantine
- In San Francisco, Virus Is Contained but Schools Are Still Closed
- When parents lose their jobs, children suffer. But sometimes there’s a consolation.
- The Double Whammy of Seasonal Affective Disorder in a Season of Covid
- Masks Work. Really. We’ll Show You How
- Eli Lilly said its antibody treatment does not work on patients hospitalized with Covid-19

Reuters
- U.S. strikes deal with Lilly for potential COVID-19 antibody drug
- Novavax delays U.S. trial of COVID-19 vaccine to November
- U.S. reports world record of more than 100,000 COVID-19 cases in single day
- Peru reports first diphtheria case in 20 years amid low vaccination rate
- Regeneron says its COVID-19 antibody treatment cut medical visits in trial

REGENERON News
- REGENERON'S COVID-19 OUTPATIENT TRIAL PROSPECTIVELY DEMONSTRATES THAT REGN-COV2 ANTIBODY COCKTAIL SIGNIFICANTLY REDUCED VIRUS LEVELS AND NEED FOR FURTHER MEDICAL ATTENTION
- REGN-COV2 INDEPENDENT DATA MONITORING COMMITTEE RECOMMENDS HOLDING ENROLLMENT IN HOSPITALIZED PATIENTS WITH HIGH OXYGEN REQUIREMENTS AND CONTINUING ENROLLMENT IN PATIENTS WITH LOW OR NO OXYGEN REQUIREMENTS

Science Speaks: Global ID News
- The 51st Union Conference on Lung Health: Race to secure COVID-19 vaccine doses leaves most countries behind

The Wall Street Journal
- The Covid Thanksgiving: Outdoor Heaters, Virtual Meals, Grandma Stays Home

NPR/KQED
- Thanksgiving In The Time Of COVID-19: To Grandmother's House Or No?
- Coronavirus Maps: How Severe Is Your State's Outbreak?
- Internal Documents Reveal COVID-19 Hospitalization Data The Government Keeps Hidden
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- **Medscape**
  - COVID-19 Data Dives: Claims About False COVID Deaths Are Reprehensible

- **The Washington Post**
  - At least 230,000 people have died from coronavirus in the U.S.
  - Donald Trump Jr. said covid-19 deaths are at ‘almost nothing.’ The virus killed more than 1,000 Americans the same day
  - Full hospitals, talk of rationing care: New wave of coronavirus cases strains resources
  - Some Americans refuse to wear masks even as their hometowns become covid-19 hot spots
  - Options dwindling for voters diagnosed with covid-19 as election day draws near
  - States say they lack federal funds to distribute coronavirus vaccine as CDC tells them to be ready by Nov. 15
  - United to offer free coronavirus testing on select Newark-to-London flights
  - Researchers find ‘glimmers of hope’ after inviting thousands to indoor concert amid pandemic
  - China’s Kashgar had a coronavirus outbreak. Within two days, 4.5 million people were tested
  - Taiwan celebrates record 200 days with no confirmed local coronavirus transmission

- **Bloomberg**
  - Record 200 Days With No Local Case Makes Taiwan World’s Envy
  - Pharmacies See Record Flu Shot Demand in First Season With Covid

- **Forbes**
  - Fauci Endorses National Mask Mandate But Concedes It’s Unlikely Under Trump

- **Vox**
  - Why many Americans refuse to participate in contact tracing

- **The New Yorker**
  - How the Coronavirus Hacks the Immune System

- **CDC NIOSH Science Blog**
  - NIOSH Ventilated Headboard Provides Solution to Patient Isolation During an Epidemic

- **The Asahi Shimbun**
  - Supercomputer deduces partition height to prevent virus spread

- **MedPage Today**
  - Homeless Camps Less Risky Than Shelters for COVID-19
  - Worldwide Measles Vaccination Is Flagging

- **WHO News**
  - WHO: Global TB progress at risk

- **UNICEF News**
  - Children in the poorest countries have lost nearly four months of schooling since start of pandemic – UNESCO, UNICEF and World Bank report finds

- **San Francisco Chronicle**
  - First known case in Bay Area of dual coronavirus-flu infection found in Solano County
  - UC Berkeley researchers testing sewage from millions of Bay Area residents for coronavirus
  - To avoid surge, S.F. halts reopening as coronavirus cases, hospitalizations rise
  - ‘Imminent risk of a super-spreader’: Santa Clara D.A. sues San Jose church, alleging health order violations
  - Stanford to enroll 1,000 volunteers for Johnson & Johnson coronavirus vaccine trial
  - S.F. contact tracing reached more than 80% of patients in the spring
EPIDEMIOLOGY UPDATES

- **Johns Hopkins COVID-19 in the USA** – daily summary of key data on COVID-19 in the U.S.
- **California COVID-19 by the numbers** are available on the [CDPH Website](https://www.cdph.ca.gov/Programs/QAC/COVID19/COVID19.aspx) and the [NYT Map and Table](https://www.nytimes.com/interactive/2020/06/17/us/coronavirus-tracker-state-county.html) (includes data by county)
  - California [COVID-19 Statewide Update](https://www.cdph.ca.gov/Programs/QAC/COVID19/COVID19.aspx) as of November 4, 2020
- **San Mateo County COVID-19 Dashboard**
- **Santa Clara County COVID-19 Dashboard**

ADDITIONAL COVID-19 RESOURCES

- **San Mateo County COVID-19 Guidance and Resources for Clinicians and Facilities – COVID-19 Digests**
- **Palo Alto Online tracking the coronavirus in San Mateo and Santa Clara counties**
- **California COVID-19 Data and Tools**
- **CDPH COVID-19 Assessment and Modeling Tool**
- **California Department of Corrections and Rehabilitations Population COVID-19 Tracking Dashboards**
- **COVID-19 Nursing Home Data**
- **CDC Interactive Serology Dashboard for Commercial Laboratory Surveys**
- **CDC COVID-19 Forecasts: Deaths**
- **HHS Coronavirus Data Hub**