Science Behind Mitigation Efforts: Bars and Restaurants

CONTACT TRACING IN ILLINOIS

Statewide numbers:



*Other is a catchall for anything not covered by the specific categories otherwise listed. It includes things like vacations, family gatherings, weddings, college parties.

OTHER STATES

- County Data Shows Most COVID-19 Outbreaks Occurred at Restaurants, Bars: <u>https://www.nbcsandiego.com/news/investigations/highest-number-of-covid-19-outbreaks-occurred-at-san-diego-restaurants-and-bars/2399467/</u>
- Coronavirus In Minnesota: 29 Bars, Restaurants Linked To COVID-19 Outbreaks: <u>https://minnesota.cbslocal.com/2020/08/20/coronavirus-in-minnesota-about-30-bars-restaurants-linked-to-covid-19-outbreaks/</u>
- Data shows at least 50 Ohio bars and restaurants have had outbreaks of COVID-19 since July 1: <u>https://www.wkyc.com/article/news/health/coronavirus/at-least-50-bars-restaurants-in-ohio-have-had-covid19-outbreak-since-july-first/95-1a4abce4-ce80-48ff-9847-bc5311febbe5</u>
- Many COVID Outbreaks Traced to Restaurants, Bars: <u>https://www.webmd.com/lung/news/20200812/many-community-outbreaks-of-covid-traced-to-restaurants-bars</u>

- How Bars Are Fueling COVID-19 Outbreaks: <u>https://www.npr.org/sections/health-shots/2020/08/18/902328016/how-bars-are-fueling-covid-19-outbreaks</u>
- A Virus Walks Into a Bar... As communities open up, it's becoming increasingly clear that the indoor bar scene is uniquely suited to transmission of Covid-19: <u>https://www.nytimes.com/2020/06/25/well/live/coronavirus-spread-bars-transmission.html</u>

THE STUDIES

Title: Morbidity and Mortality Weekly Report (MMWR)

Source: The CDC

Description: Findings from a case-control investigation of symptomatic outpatients from 11 U.S. health care facilities found that close contact with persons with known COVID-19 or going to locations that offer on-site eating and drinking options were associated with COVID-19 positivity. Adults with positive SARS-CoV-2 test results were approximately twice as likely to have reported dining at a restaurant than were those with negative SARS-CoV-2 test results. Eating and drinking on-site at locations that offer such options might be important risk factors associated with SARS-CoV-2 infection. Efforts to reduce possible exposures where mask use and social distancing are difficult to maintain, such as when eating and drinking, should be considered to protect customers, employees, and communities.

Study:

https://www.cdc.gov/mmwr/volumes/69/wr/mm6936a5.htm?s_cid=mm6936a5_w#F1_down)

Title: COVID-19: Four Fifths of Cases are Asymptomatic, China Figures Indicate **Source:** The BMJ

Description: Chinese authorities began publishing daily figures on April 1 on the number of new coronavirus cases that are asymptomatic, with the first day's figures suggesting that around four in five coronavirus infections caused no illness. Many experts believe that unnoticed, asymptomatic cases of coronavirus infection could be an important source of contagion.



Title: COVID-19 Outbreak Associated with Air Conditioning in Restaurant, Guangzhou, China, 2020

Source: Emerging Infectious Diseases (EID)

Description: There was an outbreak of 2019 novel coronavirus disease in an air-conditioned restaurant in Guangzhou, China from January 26–February 10, 2020. The airflow direction was consistent with droplet transmission.





Title: Community Use of Face Masks And COVID-19: Evidence from A Natural Experiment of State Mandates in the U.S

Source: Health Affairs Journal

Description: Provides direct evidence on the effectiveness of widespread community use of face masks from a natural experiment that evaluated the effects of state government mandates in the U.S. for face mask use in public on COVID-19 spread. Fifteen states plus Washington, D.C., mandated face mask use between April 8 and May15.



Title: Transmission Potential of the Novel Coronavirus (COVID-19) Onboard the Diamond Princess Cruises Ship 2020

Source: KeAi: Chinese Roots Global Impact

Description: Findings indicate that passenger-to-passenger transmission type dominated the transmission dynamics aboard the Diamond Princess ship.



Title: Estimation of the Reproductive Number of COVID-19 and the Probable Outbreak Size on the Diamond Princess Cruise Ship: A Data-Driven Analysis

Source: Elsevier: International Journal of Infectious Diseases

Description: The median with 95% CI of R0 of COVID-19 was about 2.28 during the early stage experienced on the Diamond Princess cruise ship. Unless strict infection management and control are taken, findings indicate the potential of COVID-19 to cause greater outbreak on the ship.



Title: Prevalence of SARS-CoV-2 Antibodies in HealthCare Personnel in the New York City Area **Source:** JAMA: The Journal of the American Medical Association

Description: Investigated the prevalence of antibodies against severe acute respiratory syndrome coronavirus2 (SARS-CoV-2) among HCP and associations with demographics, primary work location and type, and suspicion of virus exposure. The main outcome was seroprevalence.



Title: Clusters of Coronavirus Disease in Communities, Japan, January-April 2020 **Source:** Emerging Infectious Diseases (EID)

Description: Healthcare facilities, such as hospitals, care facilities, and nursing homes were the primary sources of clusters. Many COVID-19 clusters were also associated with heavy breathing in close proximity, such as singing at karaoke parties, cheering at clubs, having conversations in bars, and exercising in gymnasiums.

Study:

apanese Clusters.pdf

Title: Physical Distancing, Face Masks, and Eye Protection to Prevent Person-to-Person Transmission of SARS-CoV-2 and COVID-19; A Systematic Review and Meta-Analysis **Source:** The Lancet

Description: The findings of this review support physical distancing of 1 m or more and provide quantitative estimates for models and contact tracing to inform policy. Optimum use of face masks, respirators, and eye protection in public and health-care settings should be informed by these findings.

Study:



Title: Absence of Apparent Transmission of SARS-CoV-2 from Two Stylists After Exposure at a Hair Salon with a Universal Face Covering Policy — Springfield, Missouri, May 2020 **Source:** Morbidity and Mortality Weekly Report

Description: At salon a in Springfield, Missouri, two stylists with COVID-19 symptoms worked closely with 139 clients before receiving diagnoses of COVID-19, and none of their clients developed COVID-19 symptoms. These results support the use of face coverings in places open to the public, especially when social distancing is not possible, to reduce spread of SARS-CoV-2.



Title: 2019 Novel Coronavirus (COVID-19) Pandemic: Built Environment Considerations to Reduce Transmission

Source: American Society for Microbiology

Description: There is preliminary evidence that environmentally mediated transmission may be possible, specifically, that COVID-19 patients could be acquiring the virus through contact with abiotic BE surfaces.

Study:



Title: Airborne Transmission Route of COVID-19: Why 2 Meters/6 Feet of Inter-Personal Distance Could Not Be Enough

Source: International Journal of Environmental Research and Public Health

Description: The mandatory adoption of face masks would be desirable, when the progressive return to normal life is expected. Face masks represent a barrier useful to contain viral droplets nuclei exhaled by infected people as well as adequate to reduce probability of inhalation of such droplets by the surrounding healthy persons. Moreover, more extensive distancing measures (distance among persons up to 10 m) should be adopted inside indoor environments when face masks are not used.

Study:



Title: Association of the Infection Probability of COVID-19 with Ventilation Rates in Confined Spaces

Source: Building Simulation

Description: Ensuring an adequate ventilation rate is essential to reduce the risk of infection in confined spaces. Strict preventive measures (e.g., wearing masks and preventing asymptomatic infectors from entering public spaces using tests) that have been widely adopted should be effective in reducing the risk of infection in confined spaces.

Study: Pdf Ventilation and COVID Spread With a