



# Covid 19 quarantine Friends and foes



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# Topics

- ▶ What is quarantine
- ▶ Its Hx
- ▶ Benefits
- ▶ Disadvantages
- ▶ summary

# What is quarantine?

- ▶ **Classic public health intervention to curb the spread of infectious diseases**
- ▶ the separation and/or restriction of movement of persons who are not ill but are believed to have been exposed to infection to prevent transmission of diseases

# History of quarantine

- ▶ Back to 3000 years ago when people, communities or cities were marked as infected for example with plague
- ▶ Well documented in 14<sup>th</sup> century in Venice when they isolated ships from plague infected cities for 40 days before disembarkation
- ▶ Ibn Sina also recommended quarantine for patients with infectious diseases, especially tuberculosis.
- ▶ The mandatory hospital quarantine of special groups of patients, including those with leprosy, started early in Islamic history.
- ▶ Between 706 and 707 the sixth Umayyad caliph Al-Walid I built the first hospital in Damascus and issued an order to isolate those infected with leprosy from other patients in the hospital.

# COVID-19 pandemic, 2020–present

- ▶ During the COVID-19 pandemic, multiple governmental actors enacted quarantines in an effort to curb the rapid spread of the virus. Quarantine-like restrictions on movement included curfews and restrictions variously described as stay-at-home orders, shelter-in-place orders, shutdowns or lockdowns.
- ▶ On 26 March, 1.7 billion people worldwide were under some form of lockdown, which increased to 2.6 billion people two days later—around a third of the world's population.

# Self-quarantine

- ▶ **Self-quarantine** (or **self-isolation**) is a popular term that emerged during the COVID-19 pandemic, which spread to most countries in 2020.
- ▶ Citizens able to do so were encouraged to stay home to curb the spread of the disease.

# Short-term quarantines, e.g. for decontamination

- ▶ Quarantine periods can be very short, such as in the case of a suspected anthrax attack, in which people are allowed to leave as soon as they shed their potentially contaminated garments and undergo a decontamination shower.
- ▶ For example, an article entitled "Daily News workers quarantined" describes a brief quarantine that lasted until people could be showered in a decontamination tent.
- ▶ The purpose of such quarantine-for-decontamination is to prevent the spread of contamination and to contain the contamination such that others are not put at risk from a person fleeing a scene where contamination is suspect.
- ▶ It can also be used to limit exposure, as well as eliminate a vector.

# Is it useful?

- ▶ Sure it is.
- ▶ It is an effective way to protect the public
- ▶ A targeted quarantine strategy is quite efficient with only 5 days of quarantine
- ▶ One of the best ways to slowing rate of spread
- ▶ Give us needed time for better planning and mitigation
- ▶ One of the most important goal is to slow the spread of the coronavirus so that the number of people who require medical attention doesn't overwhelm hospitals
- ▶ Making balance between health facilities capacity and public demand



# What quarantine done in reality

- ▶ Less infected cases
- ▶ Less chance of contact between exposed or sick and healthy population
- ▶ Less chance for disease to spread
- ▶ Cause in decreasing sick people
- ▶ Lowering need for hospitalization (about 20 percent of sick population)
- ▶ Less burden over shoulders of front liners
- ▶ Less hospital beds involved
- ▶ Lowering need for extra hospital beds to build emergently during pandemic

# Disadvantages of quarantine

- ▶ Psychological challenges
- ▶ Social challenges
- ▶ Economic challenges
- ▶ Political and security challenges
- ▶ Educational challenges

# Psychological challenges

- ▶ An increase in common mental disorders (such as anxiety, depression and confusion) compared to expected levels in the general population
- ▶ Imagine it in 2.6 milliard people affected
- ▶ Result in a wide range of symptoms of psychological stress and disorder, including low mood, insomnia, stress, anxiety, anger, irritability, emotional exhaustion, depression and post-traumatic stress symptoms
- ▶ Low mood and irritability specifically stand out as being among the most common side-effects of being locked down for a long period of time, stressing for reasons such as the fear of becoming sick or of losing loved ones, as well as the prospect of financial hardship

# Social challenges

- ▶ Infodemic: reliance on fake media news
- ▶ Increasing racism, isolation, radicalism and marginalism
- ▶ Hardship in availability of medical or social assistances

# Economic challenges

- ▶ Already bitten economics will shrink again
- ▶ World spread economic recession
- ▶ Losing jobs and insurances
- ▶ Uncertain way to economic recovery even after pandemic

# Political and security challenges

- ▶ Uncertainty and the fact that today decisions will have a great impact in future; two important factors limping decision maker all around the world
- ▶ Bad economy may result in social unrest, immigration
- ▶ Shift of security concerns toward pandemic and neglect real security issues

# Educational challenges

- ▶ 90% of education now is going “online”
- ▶ The school closures are one of the most visible – and controversial problems hit young population
- ▶ Given that time spent in education appears to shape adult IQ – this could result in serious, lifelong effects on their cognitive ability
- ▶ For those in the most critical periods of adolescence, it may even increase the risk of mental illness, delaying their cognitive, emotional and social development
- ▶ Poorest hit hardest

# Summary

- ▶ Quarantine is effective and necessary for disease control
- ▶ It should be decided in accordance with national and international multidisciplinary plans
- ▶ Many factors will affect it
- ▶ **Local targeted** quarantine may be a useful way for support of other efforts