

COVID-19 Mask Guide

Masks are recommended to help prevent respiratory droplets from traveling into the air and possibly infecting other individuals. When a mask is properly worn, around both the nose and mouth, it reduces the spray of droplets and protects:

- Other people if the person wearing the mask is carrying the virus.
- The person wearing the mask from other individuals around them.
- The person wearing the mask from themselves since the mask will protect your face when touching your face with contaminated hands.

Duke University evaluated the efficacy of 14 different masks by comparing the most commonly used mask types. In order of effectiveness, the top three masks were:

- A fitted N95 mask
- A three-layer surgical mask
- Cotton-polypropylene face masks

The following masks should **not** be used as they were the least effective, and nearly useless, due to the high number of respiratory droplets passing through the material:

- Folded bandanas
- Knitted masks
- Neck fleeces (gaiter masks)

Surgical masks have different ratings based off ASTM standards. Many masks look like surgical masks but in order for the mask to be effective against COVID-19 the mask should have an ASTM rating of a level 1, 2, or 3.

- If the mask does not have an ASTM rating, the virus can still travel through the mask because the particle size of the virus is smaller than what the mask protects against.

Though fitted N95 masks and three-layer surgical masks are the most effective, these masks are often reserved for healthcare workers. If using cotton or cloth face masks, the following guidelines should be adhered to for the mask to be effective.

- Fit over the nose, mouth, **and** side of the face tightly, but comfortably.
 - There should be no gaps on the side of the mask.
 - Masks with a pliable metal that can bend around the bridge of the nose can help create a tighter fit and ensure the mask stays over the nose.
- Be secured with ties or ear loops.
- Include **multiple layers** of a high thread count and water-resistant fabric.
 - Low thread counts and single layered fabrics without filters do not protect against the virus as well.
 - 100% cotton masks with a high thread count result in better filtration.
 - Masks should also have a filter, such as polypropylene.
- Be washed daily with soap and water.

- If students are not washing their masks daily the effectiveness of the mask is significantly reduced.
- Not be used if they are wet.

Because masks with one-way valves or vents allow air and droplets to be expelled, the CDC **does not** recommend the use of masks if they have an exhalation valve or vent. These masks only protect the person wearing the mask because the virus can still travel out of the valve and possibly infect other individuals.

The CDC also **does not** recommend the use of face shields as a substitute for masks; they can be used as an additional layer of protection with a mask or independently so long as 6 feet of distance is adhered to.

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Threat Mitigation and Emergency Operation Planning