N95 Tool Kit: Algorithms and Compliance 6.24.21

1500

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*Highlight denotes new content

Document reviewed: 6.24.21

Situation
Supply Chain has secured several types on N95 respirators. Some of these N95s are not intended for surgical/procedural areas. The PPE Integrated Workgroup has developed an algorithm and guide to help determine which respirators are appropriate for use.

Background
Spectrum Health Supply Chain has worked to secure stock of different brands/models of N95 respirators due to the 3M shortage. Since there are several types of N95s, Occupational Health has established fit testing clinics to ensure proper fit of N95 respirators.

Assessment
There is an abundant supply of N95s procured by Supply Chain. In order to provide enough N95s for team members, we must utilize appropriate N95s makes/models for all units to ensure that we have enough supply through the COVID-19 pandemic.

Recommendation
- The PPE Integrated Workgroup is asking that team members are fit tested and using N95 respirators appropriate for their area.
- If fit testing has not been completed, team members may use a 3M 9205+ N95 respirator with a proper seal check.
- If your unit has stock of N95s not approved for your area, please send these back to Supply Chain.

Included in this Tool Kit
- N95 Respirator Usage Guidelines Table
- N95 Respirators, 3M Brand- What’s the Difference?
- N95 Selection Algorithm for Fit Testing
- PAPR Assignment Algorithm
- PPE and Facial Hair

Reference: https://www.michigan.gov/coronavirus/0,9753,7-406-98178_98455---,00.html
## N95 Respirator Usage Guidelines Table

<table>
<thead>
<tr>
<th>Respirator Model</th>
<th>Description</th>
<th>Approved Usage</th>
</tr>
</thead>
</table>
| 3M 1860 | ▪ Dome-shaped  
▪ Blue-green  
▪ Stamped with “1860” on the front.  
▪ Regular fit  
▪ Workday # ITM-1157760 | ▪ Fluid resistant  
▪ Approved for use in surgical and procedural areas |
| 3M 1860S | ▪ Dome-shaped  
▪ Blue-green  
▪ Stamped with “1860S” on the front.  
▪ Smaller fit  
▪ Workday # ITM-1149247 | ▪ May use in other patient care areas as supplies allow |
| 3M 1870 | ▪ 3 panel  
▪ White  
▪ Stamped with “1870” on the front.  
▪ Regular fit  
▪ Workday # ITM-109691 | ▪ Fluid resistant  
▪ Approved for use in surgical and procedural areas  
▪ May use in other patient care areas as supplies allow |
| 3M 8210 | ▪ Dome shaped  
▪ White  
▪ Stamped with “3M 8210” on the front.  
▪ Universal fit  
▪ Workday # ITM-1091693 | ▪ Approved for use in non-surgical/non-procedural areas  
▪ Face shield required when splash anticipated |
| **3M 8210 Plus** | ▪ Dome shaped  
▪ White  
▪ Stamped with “3M 8210 plus on the front.  
▪ Universal fit  
▪ **Workday # ITM-1091693**  
▪ Approved for use in non-surgical/non-procedural areas  
▪ Face shield required when splash anticipated |
| **3M 8110S** | ▪ White  
▪ Stamped with “8110S” on the front  
▪ Smaller fit  
▪ **Workday # ITM-1091695**  
▪ Approved for use in non-surgical/non-procedural areas  
▪ Face shield required when splash anticipated |
| **3M 9205+** | ▪ White  
▪ Three panels  
▪ Stamped with “9205+” on the front. Universal fit  
▪ Workday # ITM-1149491  
▪ Approved for use in non-surgical/non-procedural areas  
▪ Face shield required when splash anticipated |
| **Makrite** | ▪ Dome shaped  
▪ White  
▪ Stamped with “Makrite 9500-N95” on the front. Universal fit  
▪ Workday # ITM-1024240  
▪ **Fluid resistant**  
▪ Approved for use in surgical and procedural areas |
<table>
<thead>
<tr>
<th>Product</th>
<th>Details</th>
</tr>
</thead>
</table>
| Moldex 1511 (Small) | - Dome shaped  
                     - Molded nose  
                     - Light blue  
                     - Has WHITE straps  
                     - Small - typed on top strap  
                     - Workday # ITM-1023654 |
| Moldex 1512 (Medium) | - Dome shaped  
                         - Molded nose  
                         - Light blue  
                         - Has LIGHT BLUE straps  
                         - Medium - typed on top strap  
                         - Workday # ITM-1023653  
                         - Fluid resistant  
                         - Being phased out |
| Moldex 1513 (Large) | - Dome shaped  
                        - Molded nose  
                        - Light blue  
                        - Has TAN straps  
                        - Large - typed on top strap  
                        - Workday # ITM-1023652  |
| Uniair           | - Peaked Dome shape  
                        - White  
                        - Stamped with “SH3500” on front  
                        - Universal fit  
                        - Workday # ITM-1127459  
                        - Approved for use in non-surgical/non-procedural areas  
                        - Face shield required when splash anticipated |
N95 Respirators, 3M Brand- What’s the Difference?

Spectrum Health is planning to utilize multiple versions of 3M brand N95 respirators to support staff safety.

- 3M produces both industrial (9205+ and 8210+) and medical (1870+ and 1860) N95 respirators.
- The particulate filtration efficiency with all versions is identical.
- Respirators appear similar. They are identified by the information printed on the front.

3M 9205+ and 8210+

- The 3M 9205+ and 8210+ are NOT approved for use in surgery or procedural areas due to anticipated splash risk due to lack of a fluid barrier.
- If splash is anticipated with the 3M 9305+ or 8210+, staff should don a face shield.

3M 1870+ and 1860

- Due to extremely limited quantity, 3M 1870+ and 1860 will be sequestered for surgery and procedural spaces due to anticipated splash risk.
- 1870+ and 1860 may be available for non-surgery/procedural area staff until they can be fit tested to a non-surgical grade N95 respirator (ex. Uniair, Dasheng, etc brands).
N95 Selection Algorithm for Fit Testing (Go Live July 1, 2021)

START HERE
Staff requesting for N95 fit testing

Staff member file out NIOSHA Respirator Questionnaire in ReadySet and medically cleared to wear N95?

Yes

Does staff have facial hair preventing tight seal?

Yes

Please refer to PAFR Assignment Algorithm

No

Has staff had anything to eat or drink (besides water), smoked, or chewed gum within 15 minutes?

Yes

Wait 15 minutes

No

Staff member must fill out the questionnaire to be medically cleared and reschedule their appointment.

Proceed with fit testing to 1870

No

Does staff pass fit testing with 1870?

Yes

Document Training and N95 Selection

No

Proceed with fit testing to 1860

Does staff pass fit testing with 1860?

Yes

No

Proceed with fit testing to 1860s

Does staff pass fit testing with 1860s?

Yes

No

Please refer to PAFR Assignment Algorithm
PAPR Assignment Algorithm

START HERE
Staff Requesting PAPR

Is there an adequate PAPR supply?
- Yes → Proceed with PAPR training
- No → Document training and PAPR selection

Is the PAPR request based on an allergy to the N95 Respirator?
- Yes → Has the allergy (or equivalent) been documented and approved?
- No → Instruct staff to request exemption and schedule training

Has a medical or religious exemption been approved?
- Yes → Instruct staff to request exemption or shave according to CDC guidance and reschedule N95 Fit Test based on current Spectrum Health protocols
- No → Proceed with PAPR allocation and training for Medium Risk group (e.g., hospital personnel)

Is staff in a high-risk category? (e.g., patient facing during respiratory transmission risk)
- Yes → Is PAPR available after allocation to all high-risk staff?
- No → Instruct staff to schedule N95 Fit Test before requesting a PAPR

Are PAPRs available after allocation to all high-risk staff?
- Yes → Proceed with PAPR allocation and training for Low-Risk Group (e.g., ambulatory personnel)
- No → Instruct staff to develop plan to avoid situations where respirators are required (e.g., telehealth) or delegate an individual to perform task requiring respirator who has been approved to wear one

Proceed with PAPR training
PPE and Facial Hair

Facial hair provides a barrier to the proper fit of an N95 respirator. The presence of facial hair compromises the ability of the respirator to fully protect the team member, making it impossible to verify an adequate seal of the respirator to the face. Spectrum Health team members who are required to wear an N95 respirator for their role must remove facial hair that prevents a proper fit in line with the CDC approved facial hair guidance. PAPRs will be reserved for team members who cannot fit into an N95 due to the size/shape of their face. Exemptions can be made for individuals who have a cultural or religious reason for facial hair.

The presence of facial hair compromises the ability of the mask to fully protect you:

- Certain facial hair, stubble, mustaches and beards – make it impossible to get a good seal of a mask to the face.
- Respirators rely on a good seal against the face so when you breathe air in it is drawn into the filter material where the air is cleaned.
- If there are gaps around the edges of the mask, ‘dirty’ air will pass through these gaps and into your lungs.

Team members can schedule a fit testing appointment by calling the Employee Health Event Team Hotline at 616.486.5544 or 1.877.548.3871 or email the Employee Health Services Event Team at healthassessments@spectrumhealth.org.

The CDC recommends the following facial hair styles: