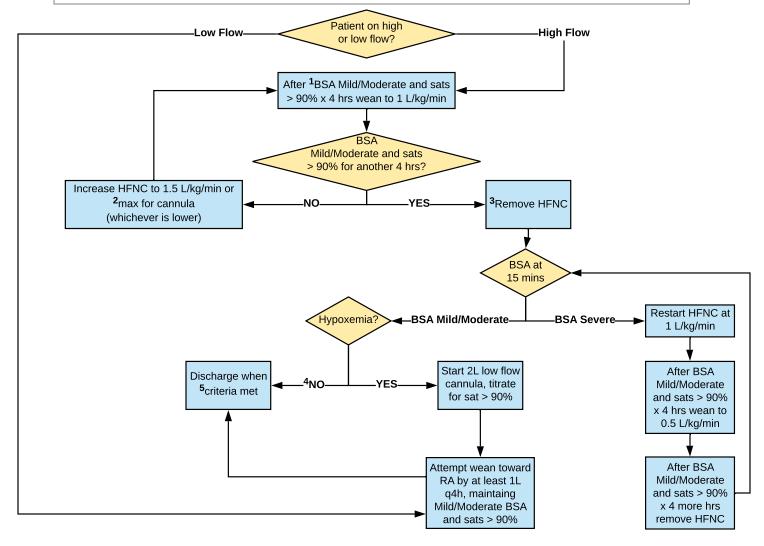


1

## Weaning Supplemental O2 for Bronchiolitis Patients at N.C. Children's Hospital (INPATIENT)

- Management of your patient may require a more individualized approach.
- Children likely not appropriate for this pathway include those with apnea, <32 week gestation, cardiac disease on home meds, pulmonary disease on home oxygen, or significant neuromuscular disease. Confirm with primary team.
- **Resident** to use ".WEANFLOW" in comment section of supplemental O2 order to specify if patient is to be weaned per pathway.
- RT to wean (flow + FiO2) and document ".BSASMART" while patient on high flow.
- **Nursing** can wean FiO2 while patient on high flow (but must communicate to RT). Once patient on low flow, nursing to wean and document ".BSASMART".



| Breathing Severity Assessment (BSA)                   |         |          |             |   |  |  |  |
|---|---------|----------|-------------|---|--|--|--|
| Highest rating in any category dictates patient's BSA |         |          |             |   |  |  |  |
| Category  |         | Mild     | Moderate    | Severe  |  |  |  |
| Respiratory<br>Rate                                   | < 3 mo  | 30-60    | 61-80       | >80 or apnea  |  |  |  |
|   | 3-12 mo | 25-50    | 51-70       | >70 or apnea  |  |  |  |
|   | 1-2 yr  | 20-40    | 41-60       | >60 or apnea  |  |  |  |
| Work of Breathing                                     |         | Normal   | Retractions | Nasal flaring,<br>grunting,<br>head<br>bobbing,<br>retracting<br>throughout |  |  |  |
| Mental Status   |         | Baseline | Fussy       | Lethargic or inconsolable   |  |  |  |

- If BSA Severe at anytime call primary team to bedside. If acutely concerned call PRRT.
- Though not part of BSA scoring, also consider O2 sat.
- BSA to be done before any intervention and again approximately 15 minutes after.

| 2 | Age        | Cannula<br>Size | Cannula<br>Max Flow | Initial<br>FiO2 |
|---|------------|-----------------|---------------------|-----------------|
|   | < 3 mo     | Sml/Med         | 8/10 LPM            |                 |
|   | 3-12<br>mo | Med/Lrg         | 10/23 LPM           | <40%            |
|   | >12 mo     | Lrg/XL          | 23 LPM              |                 |

- Only increase FiO2 over 40% for hypoxemia (sat <90%) that does not respond to suctioning or repositioning.
- If FiO2 > 40%, wean by 10-20% q2h so long as sats remain > 90%. Do not wean FiO2 at the same moment you wean flow.
- FiO2 should be < 50% before removing HFNC.
- No need to call PRRT to reinitiate HFNC.

## 4 Once off supplemental O2:

- Dc continuous pulse ox once off supplemental O2 and SpO2 > 90% x 4 hrs.

## Discharge Criteria:

- [] SpO2 > 90% (spot check ok) during a feed and nap/sleep while off O2.
- [] Adequate PO on room air to maintain hydration.
- [] If apnea occurred, no apnea for > 48 hrs.
- [] Caregiver demonstrates proper use of nasal suction device and understands supportive care.
- [] Follow up care able to be arranged by family if needed.

Pathway Owner: Steven Weinberg steven.weinberg@unchealth.unc.edu Last revision 11/1/2021