## Airway Clearance and Secretion Mobilization Devices

1. Device Type (check all that apply):

Mechanical In-Exsuffulator [complete section A]

Manual Cough Assist (“Heimlich” style maneuver) [complete section B]

Therapy: Manual Percussion: Palm cups, hands, electric precussor [complete section C]

Therapy, Postural Drainage [complete section D]

Lung Volume Recruitment [complete section E]

High Frequency Chest Wall Oscillation System (Percussion Vest) [complete section F]

Intrapulmonary Percussive Ventilation or MetaNeb [complete section G]

Other, specify (device brand and model) / [complete section H]:

Answer the sections below that correspond to the Device Types indicated in question 1.

Section A: Mechanical In-Exsufflator (e.g. cough assist device)

* 1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

* + 1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times/day

* 1. Settings:

Table Mechanical In-Exsufflator

| Inhale Pressure | Exhale Pressure | Inhale Time | Exhale Time | Pause Time | Cycles per session |
| --- | --- | --- | --- | --- | --- |
| cmH20 | cmH20 | sec | sec | sec | sets of breaths |

## Section B: Manual Cough Assist (“Heimlich” style maneuver)

Frequency of Use:

Daily

Weekly

As needed

Other, specify:

* + 1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times

1. Settings: Time per session (min):

## Section C: Therapy: Manual Percussion: Palm cups, hands, electric precussor

1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times

1. Settings: Time per session (min):

## Section D: Therapy: Postural Drainage

1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times

1. Settings: Time per session (min):

## Section E: Lung Volume Recruitment

1. Method:

Ambu bag

IPPB

Inflation by cough assist

1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times/day

1. Settings: Time per session (min):
2. Settings:

Table Lung Volume Recruitment

| Inhale Pressure | Exhale Pressure | Inhale Time | Exhale Time | Pause Time | Cycles per session |
| --- | --- | --- | --- | --- | --- |
| cmH20 | cmH20 | sec | sec | sec | sets of breaths |

## Section F: High Frequency Chest Wall Oscillation System (e.g. Percussion Vest)

1. Brand of Equipment:
2. Type of Vest Used:

Full upper body

Anterior wrap-type

Other, specify:

1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times/day

1. Settings:

Table High Frequency Chest Wall Oscillation System

| Time per session | Frequency  (this may be a range) |
| --- | --- |
| min | Hz |

## Section G: Intrapulmonary Percussive Ventilation or MetaNeb

1. Indicate type of Intervention:

Percussive Ventilation

MetaNeb

1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times/day

1. Settings:

Table Intrapulmonary Percussive Ventilation

| Time per session | Medication(s) Nebulized |
| --- | --- |
| min | Saline  Albuterol  Levoalbuterol  Dornase alpha  Ipratropium  Budesonide  Other, specify: |

1. Type of Liquid in IPV cup:

Saline

Bronchodilator + saline

Other specify:

Section H: Other Airway Clearance Method, specify**:**

1. Frequency of Use:

Daily

Weekly

As needed

Other, specify:

1. If Daily, times per day (on average):

< 1 time/day

1-2 times/day

3 or more times/day

1. Settings: Time per session (min):

## Aerosolized Medications for Airway Clearance and Secretion Management

Table Aerosolized Medications

| Medication Class | Medication Name | Concentration of each unit (eg. 44 mg/puff) | Dose (# of units / puffs) (eg. 2 puffs) | Frequency / Day (only if Daily) | Method of Delivery | Frequency |
| --- | --- | --- | --- | --- | --- | --- |
| Bronchodilator (e.g., albuterol, levoalbuterol, ipratropium) | Data to be filled out by site | Data to be filled out by site | Data to be filled out by site | < 1 time/day  1-2 times/day  3 or more times/day | Aerosol  MDI w/spacer  MDI w/o spacer  Trach collar | Daily  Weekly  As needed |
| Inhaled anti-flammatory (e.g., budesonide) | Data to be filled out by site | Data to be filled out by site | Data to be filled out by site | < 1 time/day  1-2 times/day  3 or more times/day | Aerosol  MDI w/spacer  MDI w/o spacer  Trach collar | Daily  Weekly  As needed |
| Other aerosols (e.g., saline, bicarbonate, dornase alpha) | Data to be filled out by site | Data to be filled out by site | Data to be filled out by site | < 1 time/day  1-2 times/day  3 or more times/day | Aerosol  MDI w/spacer  MDI w/o spacer  Trach collar | Daily  Weekly  As needed |

## Respiratory Support/Assisted Ventilation Devices

1. Device brand, specify:
2. Device model, specify:

Non-invasive, positive pressure (check all that apply)

Nasal mask

Nasal cannula/pillows

Oral interface

Oronasal interface

Other, specify:

### Date of Initiation of non-invasive, positive pressure (y y y y / m m/d d):

### Age at initiation (Years [Derived variable, use Date of Birth from Demographics form]):

Non-invasive, negative pressure (specify below)

Cuirass

Porta-Lung

Pneumobelt

### Rocking Bed

### Other, specify:

### Date of Initiation of non-invasive, negative pressure (y y y y / m m/d d):

### Age at initiation (Years [Derived variable, use Date of Birth from Demographics form]):

Invasive with Tracheostomy tube

### Date of Tracheostomy (y y y y / m m/d d):

### Brand/Style:

### Size mm ID:

### Length mm:

### Cuffed?

Yes

No

### If Yes, Inflation/Deflation Timing:

Inflated 24 hour/ day

Deflated 24 hour/ day

Inflated during night, deflated during the day

Other, specify:

Other, specify:

1. Ventilation mode:

Bilevel positive pressure

Spontaneous breathing with Timed backup (ST)

Average Volume Assured Pressure support (AVAPS)

Spontaneous (S)

Timed (T)

Automatic Servo Ventilation (Auto SV)

Assist Control

Pressure Control

Volume Control

SIMV with Pressure Support

Pressure Control

Volume Control

Negative Pressure:

Other, specify:

1. Ventilation Measurements

Table Ventilation Measurements

| Settings | Respiratory Rate | IPAP/PIP | PEEP/EPAP | Tidal Volume | Pressure Support (change above PEEP) | Supplemental Oxygen |
| --- | --- | --- | --- | --- | --- | --- |
| Asleep  Awake  (record only if different from asleep settings) | breaths/min | cm H20 | cm H20 | mL | cm H20 | L/min |
| Asleep  Awake  (record only if different from asleep settings) | breaths/min | cm H20 | cm H20 | mL | cm H20 | L/min |

1. Frequency of Use:

Daily

As needed

1. Schedule of Use:

### Hours per day:

Night (during sleep)

Intermittent Day time and continuous at night

Continuous

Intermittent with acute illnesses

## Oxygen

1. Method of Administration:

Trach collar

Nasal Cannula

Trans tracheal O2

Bipap or Ventilator

Face mask

Other, specify:

1. Flow Rate (L/minute):
2. Frequency of Use:

Daily (continuously or intermittent)

As needed

### Schedule of Use:

Intermittent

Continuous

### Hours per day:

1. Other relevant therapies for respiratory system (e.g. physical therapy related to respiration, aquatic therapy):

## General Instructions

This CRF contains data that would be collected when a pulmonary study is performed studying gas exchange.

Important note: None of the data elements included on this CRF Module are classified as Core (i.e., strongly recommended for pediatric neuromuscular disease clinical studies to collect if neuromuscular disease studies are performed). All data elements are classified as supplemental (i.e., non Core) and should only be collected if the research team considers them appropriate for their study. Please see the Data Dictionary for element classifications.

## Specific Instructions

Please see the Data Dictionary for definitions for each of the data elements included in this CRF Module.

The CRF includes all instructions available for the data elements at this time. More detailed instructions will be added in Version 4.0 of this CRF Module.