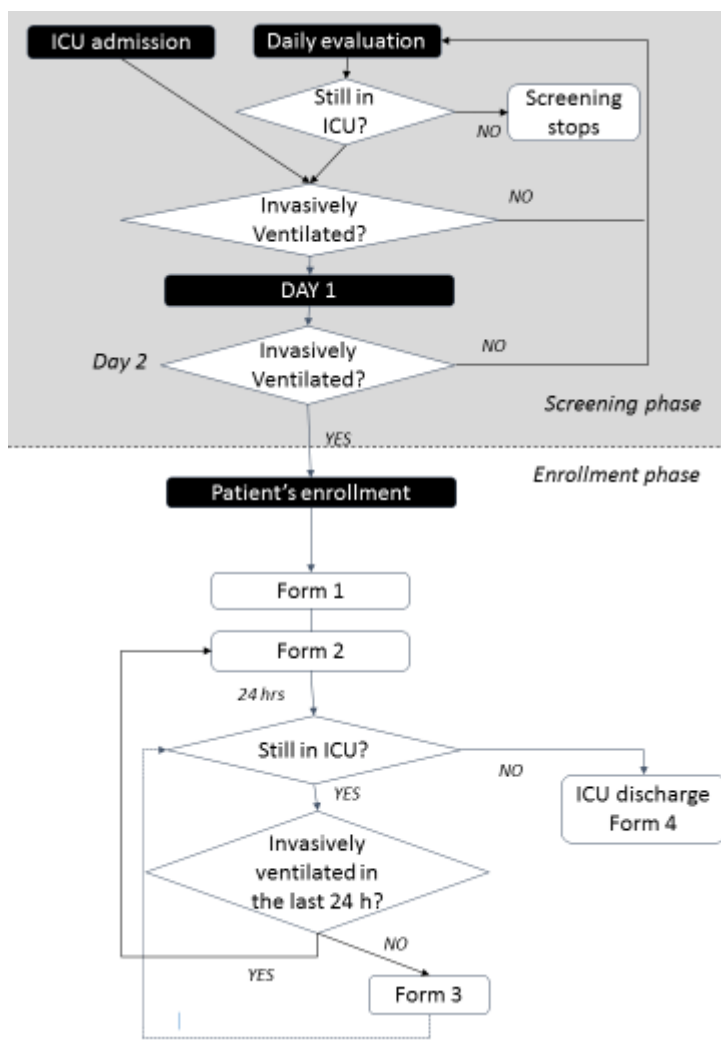


WorldwidE AssessmeNt of Separation of pAtients From ventilatory assistancE

WEAN SAFE



Data Collection Forms



SCREENING FORM

[illegible]

Center ID: _____

FORM 0: - ORGANIZATIONAL DATA OF THE PARTICIPATING ICU
TO BE FILLED ONLY ONCE FOR THE STUDY

0.1 Name of the INSTITUTION: _____

0.2 Mailing Address: _____

0.3 Phone _____

0.4 Contact person #1: _____

0.5 Email: _____

0.6 Contact person #2: _____

0.7 Email: _____

0.8 ICU Medical Director: _____

0.9 ☐ Open ICU ☐ Closed ICU [ONE SELECTION ONLY]

0.10 Type of hospital: ☐ University/Academic ☐ Non-University [ONE SELECTION ONLY]

Type of ICU (check all that apply):

0.11 ☐ Medical

0.12 ☐ Respiratory ICU

0.13 ☐ Surgical

0.14 ☐ Cardiothoracic

0.15 ☐ Neurosurgical

0.16 ☐ Other specialty

0.17 Total number of beds in the hospital: _____

0.18 Number of beds in use in the ICU at commencement of study: _____

0.19 Total number of admissions to the ICU in last calendar year: _____

0.20 Total number of ICU beds in the hospital (including all ICUs, also not involved in this study, excluding intermediate care): _____

0.21 Was this ICU involved in research activities (other than surveys) in the last 5 years?
☐ YES ☐ NO [ONE SELECTION ONLY]

0.22 Is there a step-down/intermediate care unit in your hospital?
☐ YES ☐ NO [ONE SELECTION ONLY]

0.23 Does this hospital have a dedicated weaning facility within the hospital?
☐ YES ☐ NO [ONE SELECTION ONLY]

Average number of Health Professionals **present** in the ICU¹:

	Daytime	Night time
Staff Physicians	0.24	0.25
Doctors in training/Non-staff	0.26	0.27
Nurses/Nurse practitioners	0.28	0.29
Physician assistants	0.30	0.31
Occupational Therapists	0.32	0.33
Physiotherapists	0.34	0.35
Pharmacists	0.36	0.37
Respiratory Therapists	0.38	0.39

Which UNITS are used for the following:

0.40 **Noradrenaline/norepinephrine:** ☐ mcg/min ☐ mcg/kg/min ☐ mg/hour [ONE SELECTION ONLY]

0.41 **Adrenaline/epinephrine:** ☐ mcg/min ☐ mcg/kg/min ☐ mg/hour [ONE SELECTION ONLY]

0.42 **Dopamine:** ☐ mcg/min ☐ mcg/kg/min ☐ mg/hour [ONE SELECTION ONLY]

0.43 **Dobutamine:** ☐ mcg/min ☐ mcg/kg/min ☐ mg/hour [ONE SELECTION ONLY]

0.44 **Blood gases?** ☐ mmHg ☐ kPa [ONE SELECTION ONLY]

0.45 **Platelets:** ☐ 10³/mm³ ☐ 10⁹/L [ONE SELECTION ONLY]

0.46 **Hemoglobin:** ☐ g/100 ml ☐ g/L ☐ mmol/L [ONE SELECTION ONLY]

0.47 **Height:** ☐ inch ☐ cm [ONE SELECTION ONLY]

0.48 **Weight:** ☐ lbs ☐ kg [ONE SELECTION ONLY]

0.49 Do you use written/electronic sedation protocols? ☐ YES ☐ NO [ONE SELECTION ONLY]

0.50 Do you use a sedation scale? ☐ YES ☐ NO [ONE SELECTION ONLY]

0.51 (IF YES: ☐ SAS ☐ RASS ☐ Ramsay ☐ Other _____)

0.52 Does your ICU have weaning protocols for patients ventilated > 24 hours? ☐ YES ☐ NO [ONE SELECTION ONLY]

0.53 If yes: ☐ Physician driven ☐ Nurses driven ☐ RT driven [ONE SELECTION ONLY]

0.54 Please upload your protocol.

0.55 Do you use automated weaning system?

☐ YES ☐ NO [ONE SELECTION ONLY]

0.56 If yes, please indicate which one: _____

¹ This number may be less than 1.0, particularly for allied health professionals such as physiotherapists. If so, please estimate amount of time as a proportion of a full working day spent by these personnel in the ICU.

Study Patient ID: _____

Date of Data collection: _____

FORM 1: TO BE COMPLETED FOR ALL PATIENTS INVASIVELY VENTILATED ON DAY 2

1.1 Date of enrollment (between 7AM and 10AM on day 1): __/__/__

1.2 Date and hour of commencement of IMV: __/__/__(DD/MM/Year)

1.3 at _____ (24 hour clock)

1.4 Date of ICU admission in the current episode: __/__/201__ (DD/MM/Year)

1.5 Gender: M F [ONE SELECTION ONLY]

1.6 Age: _____

What was the reason for the ICU admission?

1.7 ☐ Medical OR non-surgical

1.8 ☐ Scheduled Surgery

1.9 ☐ Emergency surgery and /or Trauma

1.10 ☐ Monitoring (e.g. in situ thrombolysis, desensitization), or post procedure (including PCI, bronchoscopy)

Hospital Admission

1.11 Date of presentation in current Hospital: __/__/201__ (DD/MM/Year)

1.12 Height (first documented at ICU admission): _____

1.13 Weight (first documented at ICU admission): _____

1.14 Residence Status prior to hospital admission [ONE SELECTION ONLY]

☐ Home

☐ Other healthcare facility

☐ Nursing home

☐ Unknown

☐ Homeless

1.15 Admission Source: [ONE SELECTION ONLY]

☐ ICU

☐ Ward

☐ ER

☐ OR/Recovery

☐ Other, please specify _____

1.16 Was the patient intubated (excluding elective surgery) during this hospital admission prior to enrollment?

☐ YES

☐ NO

[ONE SELECTION ONLY]

1.17 Was the patient previously enrolled in this study? ☐ YES

☐ NO

[ONE SELECTION ONLY]

1.18 (If yes, indicate the patient's code _____)

Co-morbidities present before ICU admission (check all that apply):

1.19 ☐ COPD (If known, GOLD: ☐ I ☐ II ☐ III ☐ IV)

1.20 ☐ Interstitial Lung Disease

1.21 ☐ Other chronic lung disease

1.22 ☐ Asthma

1.23 ☐ Active solid organ Neoplasm²

1.24 ☐ Hematologic neoplasm

1.25 ☐ Bone marrow transplant

1.26 ☐ Diabetes Mellitus

1.27 ☐ Heart failure: NYHA classes III-IV

1.28 ☐ Chronic Renal Failure

1.29 ☐ Immunosuppression³

² Excluding non-melanoma skin cancer

³ Includes drugs such as cyclosporine, azathioprine, rituximab or cancer chemotherapy, steroids (except for adrenal insufficiency replacement)

1.30 ☐ Chronic liver failure (1.31 ☐ Child-Pugh Class C) 1.32 ☐ Congenital/Acquired Myopathies/Neuropathies
 1.33 ☐ alcohol abuse 1.34 ☐ active smoker 1.35 ☐ pulmonary hypertension 1.36 ☐ kyphoscoliosis
If gender=F 1.37 **Pregnancy [ONE SELECTION ONLY]** ☐ Yes ☐ No ☐ Unknown

1.38 **Extent of Cognitive Deterioration (in the 2 months prior to first ICU admission)** [ONE SELECTION ONLY]
☐ None ☐ Mild ☐ Moderate/severe

1.39 **Activities of daily living (in the 2 months prior to first ICU admission)** [ONE SELECTION ONLY]
☐ Independent ☐ Partially dependent ☐ Completely dependent ☐ Unable to assess

1.40 **Clinical Frailty Scale Score (in the 2 months prior to first ICU admission)** [ONE SELECTION ONLY]

1. Very fit — robust, active, energetic, well motivated and fit; exercise regularly; most fit group for their age
2. Well — without active disease, but less fit than people in category 1
3. Managing Well, with treated comorbid disease — disease symptoms are well controlled
4. Apparently Vulnerable — not frankly dependent, patients “slowed up” or have disease symptoms
5. Mildly Frail — with limited dependence on others for instrumental activities of daily living
6. Moderately Frail — help is needed with all outside activities and with keeping house, i.e. in both instrumental and non-instrumental activities of daily living
7. Severely frail — completely dependent on others for personal care, from whatever cause (physical or cognitive).
8. Very Severely Frail — Completely dependent, approaching the end of life. Terminally Ill – life expectancy < 6 months, whether or not evidently frail.

What is/are the cause(s) of the patient’s ICU admission (check all that apply)?

- 1.41 ☐ Hypercapnic Respiratory Failure
 1.42 ☐ Hypoxaemic Respiratory Failure
 1.43 ☐ Sepsis/septic shock
 1.44 ☐ Cardiogenic pulmonary edema
 1.45 ☐ Cardiac arrest
 1.46 ☐ Emergency surgery
 1.47 ☐ Elective surgery (1.48 ☐ CARDIAC 1.49 ☐ ABDOMINAL 1.50 ☐ THORACIC
 1.51 ☐ NEUROSURGICAL 1.52 ☐ Other _____)
 1.53 ☐ Shock (other than septic)
 1.54 ☐ Trauma
 1.55 ☐ Neurologic impairment
 1.56 ☐ Drug overdose
 1.57 ☐ Airway protection
 1.58 ☐ Other (_____)
 1.59 ☐ Metabolic/electrolyte

Study Patient ID: _____

Date of Data collection: _____

FORM 2: DAILY DATA COLLECTION FORM

THIS FORM HAS TO BE FILLED EVERY DAY, REPORTING DATA COLLECTED BETWEEN 7-10 am

2.1 Was Patient invasively ventilated in the last 24 hours? ☐ YES ☐ NO (Go to form 4) [ONE SELECTION ONLY]

2.2 Patient's interface: ☐ ETT ☐ Tracheostomy ☐ Not invasively ventilated anymore [ONE SELECTION ONLY]

2.3 Sedation level: _____ ☐ RASS ☐ SASS ☐ RAMSAY ☐ if not measured [ONE SELECTION ONLY]

2.4 Was a sedation interruption planned: ☐ Yes ☐ No [ONE SELECTION ONLY]

What is the current (at the time of evaluation) level of ventilator assistance received (if on separation attempt, please give prior level of assistance)?

2.5 ☐ Volume A/C 2.6 ☐ PC/BIPAP/APRV 2.7 ☐ SIMV 2.8 ☐ PRVG 2.9 ☐ PSV
2.10 ☐ NAVA 2.11 ☐ CPAP 2.12 ☐ T-Tube 2.13 ☐ Other (specify) _____

Please record ventilator settings immediately prior to Arterial Blood Gas Analysis:

2.14 Peak _____ 2.15 Plateau (if different) _____
2.16 RR (set) _____ 2.17 RR (total) _____ 2.18 PEEP (cmH₂O) _____
2.19 PIP (cmH₂O) _____ (specify depending on mode) 2.20 Plateau P (if different) (cmH₂O) _____
2.21 FiO₂ _____ 2.22 Actual Tidal volume _____ 2.23 **pO₂** _____ (if measured)

Arterial Blood Gas (if measured): 2.24 pH: ____ . ____ 2.25 PaO₂: ____ ____
2.26 PaCO₂: ____ ____ 2.27 Lactate ____ . ____

2.28 If no Arterial Blood Gas Analysis: Pulse Oximeter SpO₂: ____ %

2.29 **What is the lowest level of assistance received in the last 24 hours? IF DIFFERENT FROM ABOVE**
[ONE SELECTION ONLY]

☐ Volume A/C ☐ PC/BIPAP/APRV ☐ SIMV ☐ PRVG ☐ PSV
☐ NAVA ☐ CPAP ☐ T-Tube ☐ Other (specify) _____
☐ Accidental Extubation ☐ Planned Extubation

2.30 Peak _____ 2.31 Plateau (if different) _____ [if cmv]
2.32 RR (set) _____ 2.33 RR (total) _____ 2.34 PEEP (cmH₂O) _____
2.35 FiO₂ _____ 2.36 Actual Tidal volume _____ 2.37 **pO₂** _____ (if measured)

2.38 How long was this level maintained for? _____ hours

2.39 What was the reason? (planned/patient deterioration)

Arterial Blood Gas(if measured): 2.40 pH: ____ . ____ 2.41 PaO₂: ____ ____
2.42 PaCO₂: ____ ____ 2.43 Lactate ____ . ____

2.44 If no Arterial Blood Gas Analysis: Pulse Oximeter SpO₂: ____ %

2.45 **Was this a spontaneous breathing trial (SBT), to predict success in separating the patient from the ventilator?**
☐ YES ☐ NO [ONE SELECTION ONLY]

SOFA Score (every third day from day 2, 5, etc.)**Values****NOT AVAILABLE**

Glasgow Coma Scale (3-15)

2.46 motor

2.47 eye

2.48 verbal

1

☐

2.49 Platelet Count(UNITS)

☐

2.50 Total Bilirubin (if measured)

☐

2.51 Creatinine (if measured)

☐

2.52 OR Urine Output (mL/day)

☐

2.53 Mean Arterial Pressure (mmHg)

2.54 Dopamine infusion

☐

2.55 Dobutamine infusion

☐

2.56 Noradrenaline infusion

☐

2.57 Adrenaline infusion

☐

2.58 Others vasopressors? (Yes/No) or dosage?

2.59 PDE inhibitors (Yes/No) or dosage?

In the last 24 hours, did the patient receive any of the following drugs:

2.60 Sedatives[ONE SELECTION ONLY]:

Continuous ☐Intermittent ☐None ☐

2.61 Opioids[ONE SELECTION ONLY]:

Continuous ☐Intermittent ☐None ☐

2.62 NM blockers[ONE SELECTION ONLY]:

Continuous ☐Intermittent ☐None ☐

2.63 Steroids[ONE SELECTION ONLY]:

High dose ☐Low dose ☐None ☐

2.64 Diuretics[ONE SELECTION ONLY]:

High dose ☐Low dose ☐None ☐2.65 Renal replacement therapy [ONE SELECTION ONLY] ☐ YES☐ NO2.66 Is the patient receiving ECMO/ECCO2R ☐ YES☐ NO Blood flow _____ l/min

PART B: - TO BE FILLED FOR PATIENTS WITH PEEP < 10 cm H₂O, and FiO₂ < 50%, if they are not receiving neuromuscular blockers or high doses of vasopressors (> 0.2 mcg/kg/min of noradrenaline or equivalent)

What are the reasons for not separating the patient from the ventilator according to the attending physician (check all that apply)?

- 2.67 ☐ Unresolved surgical condition
- 2.68 ☐ Unresolved respiratory failure
- 2.69 ☐ Upper airway protection
- 2.70 ☐ Decreased level of consciousness
- 2.71 ☐ Agitation/ delirium
- 2.72 ☐ Cardiac failure / Fluid Overload
- 2.73 ☐ Hemodynamic instability
- 2.74 ☐ Muscle weakness
- 2.75 ☐ Planned intervention requiring airway protection
- 2.76 ☐ Failed spontaneous breathing trial
- 2.77 ☐ Recent [< 24 hours] re-intubation
- 2.78 ☐ Excessive secretion
- 2.79 ☐ Weak cough

2.80 **Maximum Inspiratory Pressure (if measured in the last 24 hours)** _____ cmH₂O

2.81 **Is this patient considered in weaning phase according to the attending physician?**

☐ Yes ☐ No ☐ Uncertain ☐ Unknown [ONE SELECTION ONLY]

2.82 **Amount of secretions:** ☐ none/mild ☐ moderate ☐ abundant [ONE SELECTION ONLY]

2.83 **Cough strength:** ☐ weak ☐ intermediate ☐ normal/strong
 ☐ NOT RECORDED [ONE SELECTION ONLY]

2.84 **Was the patient out of the bed last 24 hours?** ☐ Yes ☐ No [ONE SELECTION ONLY]

2.85 **Did the patient do mobility exercise last 24 hours?**

☐ Yes, active ☐ Yes, passive ☐ No [ONE SELECTION ONLY]

2.86 heart rate _____

2.87 fluid balance _____

2.88 sodium _____

2.89 potassium _____

Study Patient ID: _____

Date of Data collection: _____

FORM 3: DAILY DATA COLLECTION FORM FOR PATIENTS NOT CONNECTED TO THE VENTILATOR IN THE LAST 24 HOURS

IN THE LAST 24 HOURS DID THE PATIENT RECEIVE ANY OF THE FOLLOWING? (Check all that apply)

- 3.1 ☐ Face mask/Nasal cannula low flow oxygen (<15)
- 3.2 ☐ NIV/CPAP Helmet
- 3.3 ☐ NIV/CPAP Face/Nose Mask
- 3.4 ☐ High Flow nasal cannula
- 3.5 ☐ None of the above

IF YES, WHAT WAS THE REASON? (Check all that apply)

- 3.6 ☐ Hypoxia
- 3.7 ☐ Hypercapnia
- 3.8 ☐ Respiratory distress
- 3.9 ☐ Prophylaxis
- 3.10 ☐ Restoration of home ventilation (including Sleep Apnea Syndrome)

Study Patient ID: _____

Date of Data collection: _____

FORM 4: - OUTCOMES – ICU DISCHARGE/DEATH

ICU Outcome

4.1 ☐ Alive ☐ Dead [ONE SELECTION ONLY]

4.2 Date of ICU discharge/Death: __/__/____ (DD/MM/Year)

For pts discharged alive

4.3 Discharged to: [ONE SELECTION ONLY]

☐ Other ICU ☐ Hospital Ward ☐ Intermediate Care Unit ☐ Hospital Discharge ☐ Weaning unit

Respiratory status at ICU Discharge (check all that apply):

4.4 ☐ Intubated 4.5 ☐ Tracheostomy 4.6 ☐ Non-invasive ventilation

4.7 ☐ Oxygen therapy 4.8 ☐ No oxygen therapy

4.9 Level of physical Dependence (at discharge) [ONE SELECTION ONLY]

☐ Independent ☐ Partially Dependent ☐ Completely Dependent

Changes in Goals of Care

4.10 Was there a pre-existing order limiting life-sustaining measures prior to ICU admission?
(E.g. withhold/withdraw)

4.11 Was there a decision to limit a life sustaining measure at any time during the ICU stay?
☐ Yes ☐ No ☐ Not legally available [ONE SELECTION ONLY]

What was the life sustaining measure limited?

4.12 ☐ No CPR

4.13 ☐ No re-intubation

4.14 ☐ No re-admission to ICU

4.15 ☐ ICU trial

4.16 ☐ Full comfort care [i.e. no organ support]

4.17 ☐ Terminal extubation.

4.18 Did the difficulty in weaning influence the decision to limit life-sustaining measures? [ONE SELECTION ONLY]

☐ No

☐ Yes – Sole/major reason

☐ Yes – One of a number of reasons

4.19 Date of decision to withhold/withdraw life sustaining measures: __/__/____

Hospital (or 90 day) Outcome (whichever event occurs first)

4.20 ☐ Alive ☐ Dead [ONE SELECTION ONLY]

4.21 Date of hospital discharge: __/__/____