

## Guidelines for the Use of Physical Restraint in Patients on the Intensive Care Unit

Reference No:

### Summary

No legal or ethical difference exists between physical and chemical restraint. All restraining therapy should be specific to the patients needs and agreed by a multidisciplinary team. All patients should be restrained for the least time possible with clear objectives of what is to be achieved by using restraint.

### Introduction

Sedation is associated with increasing use of inotropes, prolonged ventilation, ventilator associated pneumonia, pressure sores and feeding intolerance. Modern intensive care practice has changed to allow patients who require considerable support, to be awake or easily roused, in order to minimise these side effects and complications of sedation.

ICU psychosis or delirium is a reversible condition that occurs in patients who have had heavy sedation and is often associated with prolonged admissions. These patients have often had multi-organ failure with a degree of septic encephalopathy and are often sedation resistant or poorly tolerant of the sedation that is available.

The patients that survive the acute illness will require a gradual withdrawal of support and sedation. This is often a very difficult and high-risk time for both the staff and the patient. Dislodged cannulae and endotracheal tubes are both associated with morbidity and mortality. These patients can be very calm one minute and trying to pull out tubes and lines the next. Even with one to one nursing it may not be possible to prevent this. In these circumstances most sedative agents are either ineffective or require such large doses so as to render the patient anaesthetised and not sedated. This hinders rather than helps patient care. These patients are confused and in no way able to make a rational judgement or to be reasoned with. Physical restraint may be used to help manage these episodes.

The Mental Capacity Act 2005 will soon be in force. Section 6 provides that when restraining a patient, a clinician must satisfy two tests:

- 1) The first condition is that the clinician reasonably believes that it is necessary to do the act in order to prevent harm to P;
- 2) The second is that the act is a proportionate response to-
  - (a) the likelihood of P's suffering harm, and
  - (b) the seriousness of that harm.

Any restraint that is used in ICU must satisfy these conditions.

## **Areas for use**

Adult intensive care units at the Derbyshire Royal Infirmary and Derby City General Hospital

## **Aim and Scope**

- This guideline applies to adults (18 years and above) only.
- To protect multiprofessional clinical staff involved in the physical restraint of critically ill patients from its inappropriate use.
- To facilitate delivery of care that follows legal and professional principles including beneficence, non maleficence, justice, autonomy and The Human Rights Act.
- To ensure that the requirements of the Mental Capacity Act 2005 are met.
- To ensure that patients are assessed as individuals, acknowledging that behavior is influenced by a number of different factors.
- To enable multi disciplinary identification and subsequent management therefore minimizing physical and psychological harm and effects.
- To provide a process that ensures that when any form of restriction is considered, it is not a first line control measure.
- To limit the inappropriate use of sedatives and analgesics in ICU patients.
- To decrease time spent on a ventilator.
- To improve patient safety.
- To improve patient outcome.

## **Definitions Used**

ICU patient:	Any patient in the intensive care unit
Senior clinician:	The ICU consultant in charge of the unit at the time
Senior nurse:	The nurse coordinating the shift
Patient's nurse:	The nurse assigned to look after the patient on the shift
Autonomy:	To aid and respect the client's right for determination
Beneficence:	The intention to do the patient good
Clinical direction:	Instructions given by members of the multidisciplinary team in support of the patient treatment, care management, safety or security.
Diminished capacity:	Where patient's cognitive and processing abilities have been

diminished by injury or illness-to the extent that they are unable to identify risk or danger, store information appropriately, and/or make appropriate decisions regarding their care.

Health Care Professionals:	A qualified registered member of a Health Care Profession
Justice:	To treat all clients fairly and equally.
Non-maleficence:	The intention to do the client no harm.
Risk Assessment:	A document and management tool that aids the professional in Considering options and control measures and which provides a record of assessment and management actions taken.
Use of restriction:	Restricting someone's liberty or preventing him or her from doing something they want to do. In general restraint is described as an intervention that prevents a person from behaving in "ways that threaten or cause harm to themselves, others or to property" (Duff et al 1996)

### **Implementing the Guideline**

#### Indications

- 1) Restless patient who is at risk of self harm due to unintentional abnormal behaviour.
- 2) Treatable physical causes of anxiety and distress should first be excluded (including but not exclusively pain, acute psychosis, sepsis, drug withdrawal etc)

#### Absolute contraindications to physical restraint

- 1) Any patient with unstable orthopaedic injuries
- 2) Thrashing violent patients
- 3) Insufficient number of nurses on a shift to have a 1:1 nursing ratio
- 4) Insufficient staff that are trained to use physical restraint.

#### Relative contraindications to physical restraint

- 1) Patients who are anti coagulated or have a coagulopathy.
- 2) Open wounds or skin grafts on affected limbs
- 3) General condition of the patients skin and increased 'Waterlow Score' should prompt consideration as to whether physical restraint is appropriate for the individual patient

**ASSESSMENT:**

- 1) Assess patient's behaviour, such as confusion, disorientation, agitation, inability to follow commands.
- 2) Determine the patient's need for restraint using the ICU PHYSICAL RESTRAINT ALGORITHM.
- 3) Physical restraint option has been agreed with the Consultant, shift Charge and Bedside Nurse.
- 4) Inspect area where restraint is to be placed. Assess condition of skin underlying area on which restraint is to be applied. This will provide baseline observation to monitor patient's skin integrity.

Restraints should not be placed over access devices such as arterial lines and AV dialysis shunt.

Nurse should be familiar with all devices used for patient care and protection. Incorrect application of restraint device may result in patient's injury or death.

- 5) Patient and family should be informed about the use of restraint. Explain that it is temporary and designed to protect patient from injury.

**IMPLEMENTATION:**

1. Approach patient in a calm, confident manner and explain what you plan to do.
2. Gather equipment and wash hands.
3. Provide privacy & ensure dignity.
4. Be sure patient is comfortable and in correct anatomical position. This is to prevent contractures and neurovascular impairment.
5. Pad skin and bony prominences (if necessary) that will be under the restraint. This will reduce friction and pressure from restraint to skin and underlying tissue.
6. Apply selected restraint. Always refer to manufacturer's instructions.
  - a. Mitten restraint: thimbles mitten device to restrain patient's hands. This prevents patients from dislodging invasive equipment, removing dressing, or scratching.
  - b. Extremity restraint: restraint designed to immobilize one or two extremities. Protects patients from injury from accidental removal of therapeutic device (e.g., CVP line, tracheostomy tube).

7. Attach restraint straps to bed frame when head of bed is raised or lowered. Do not attach to side rails. Patients may be injured if restraint is secured to side rail and it is lowered.
8. Insert two fingers under secured restraint. Checking for constriction prevents neurovascular injury.
9. Proper placement of restraint, skin integrity, pulses, temperature, colour, and sensation of the restrained body part should be assessed at least every hour. Frequent assessments prevent complication, skin breakdown, and impaired circulation.

Observations should be documented at the bottom left hand side of the ICU chart.

Restraint Observation:													
Circulation Adequacy													
Skin Intact													

Y= yes

N=no

10. Reassess patients need for continued use of restraint as identified by the 'Restraint Option Plan' with the intent of discontinuing restraint as soon as patients condition no longer prevents adequate care.

### **References:**

- 1) Clinical practice guidelines for the maintenance of patient physical safety in the intensive care unit: Use of restraining therapies-American College of Critical Care Medicine Task Force 2001-2002. Crit Care Med 2003;31;2665-2676
- 2) British Association of Critical Care Nurses position statement on the use of restraint in adult critical care units. Nursing in Critical Care 2004;9:199 212
- 3) Derby Hospitals NHS Foundation Trust. Risk Assessment & Management tool for the prevention of harm to patients who have diminished capacity

**Documentation Control**

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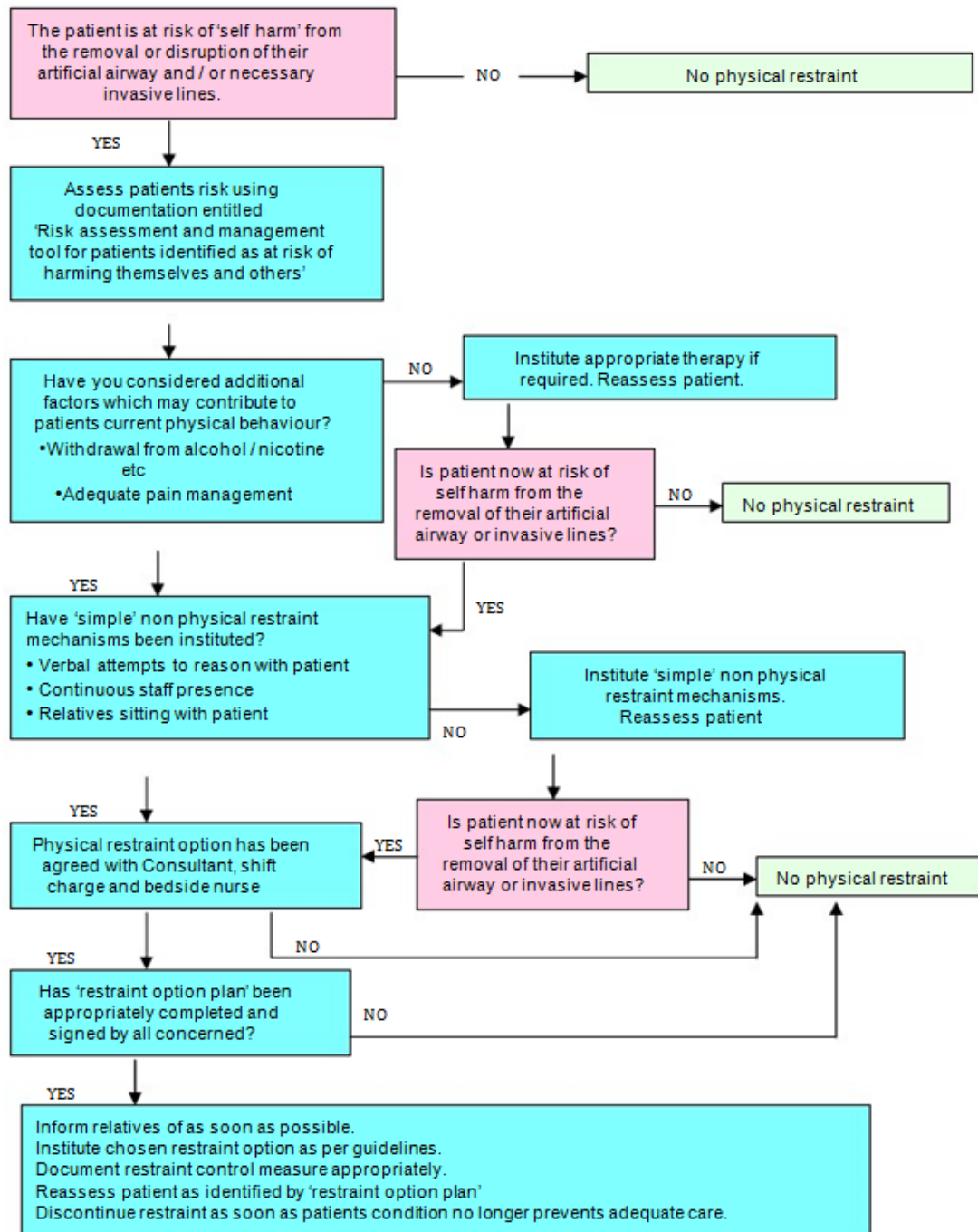
**Approved by  
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### ICU PHYSICAL RESTRAINT ALGORITHM



DERBY HOSPITALS NHS FOUNDATION TRUST

ICU PHYSICAL RESTRAINT OPTION PLAN

Time \_\_\_\_\_

Date \_\_\_\_\_

Patient Sticker

INDICATION

Patient is at risk of 'self harm' from the removal or disruption of their artificial airway and / or necessary invasive lines.

☐

DAY

Consultant \_\_\_\_\_

Shift Charge (AM) \_\_\_\_\_ (PM) \_\_\_\_\_

Bedside Nurse (AM) \_\_\_\_\_ (PM) \_\_\_\_\_

NIGHT

Consultant \_\_\_\_\_

Shift Charge \_\_\_\_\_

Bedside Nurse \_\_\_\_\_

Non Physical / Non Chemical restraint plan

- Bedside nurse constantly in attendance
- Bedside nurse and HCA in attendance constantly

☐☐

Physical restraint option

Mitten Hands

☐

Loose Arm Restraints

☐

- Have the patient's relatives been informed of restraint option chosen?

Comments

YES

NO

☐☐