#### TRUST POLICY AND PROCEDURES FOR THE SAFE USE OF BEDRAILS IN PAEDIATRIC SETTINGS

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			Senior falls p	ractitioner – prevention
			and manager	nent
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			Keightley	MHRA
Intended Recipients: /	All clinical a	nd non-clinical staf	f involved in th	e care and management
of paediatric patients	including ag	gency staff and stu	dents.	

Training and Dissemination: Dissemination via the Trust Intranet.

Guidance is included within:

- Falls prevention and management training (induction and 2 yearly).
- Mandatory Moving and Handling level 2 training (induction and 2 yearly).
- Arjo bed and mattress training.

**To be read in conjunction with:** Trust Policy and Procedure for the Prevention and Management of Patient Falls; Health and Safety - UHDB Trust Policy and Procedure; Trust Policy for Incident Reporting, Management and Learning; Joint Derby and Derbyshire Health & Social Care Policy for the Safe Use of Bed Rails and Bed Area Equipment in the Community; Infection Prevention and Control - UHDB Trust Policy and Procedure; Safety Management Standard Moving and Handling; Consent - Including the Mental Capacity Act (Lawful Authority for Providing Examination, Care or Treatment) - Trust Policy and Procedures.

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Contact for Review	UHDB Falls Group	
Executive Lead Signature	Donna Bird Interim Executive Chief Nurse	

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#### **1 INTRODUCTION**

Bed rails are 'medical devices', which fall under the authority of the Medicines and Healthcare Products Regulatory Agency (MHRA). Bed rails are used extensively in hospital settings, care homes and people's own homes to reduce the risk of bed occupants falling out of bed or trolleys and injuring themselves. For this document the term bed rail will be adopted, although other names are used for example, bed side rails, side rails, cot sides and safety sides.

Recent literature reports most falls from beds resulted in either no harm or minor injuries such as scrapes and bruises. People who fell from beds without bed rails were significantly more likely to be injured and to suffer head injuries (usually minor). Falls from beds with bed rails are usually associated with lower rates of injury, but these injuries are significantly more serious (Health and Safety Executive 2012).

From 1 January 2018 to 31 December 2022, the MHRA received 18 reports of deaths and 54 reports of serious injuries related to medical beds, bed rails, trolleys, bariatric beds, lateral turning devices and bed grab handles. The majority of these were due to entrapment or falls (NPSA Aug 2023).

#### 2 PURPOSE AND OUTCOMES

The purpose of this policy is to:

- Reduce harm to children caused by falling from beds or becoming entrapped in bedrails.
- Support children and staff to make individual, evidenced based decisions around the risks of using and of not using bedrails.
- Ensure compliance with Medicines and Healthcare Related products Agency (MHRA) and National Patient Safety Agency (NPSA) advice.

The guidance within this policy reflects best, evidenced-based practice and should be adopted by all colleagues Trustwide, including agency staff, staff with honorary contracts and students on placement. This policy applies to all paediatric patient areas within UHDB.

#### **<u>3 KEY RESPONSIBILITIES/DUTIES</u>**

#### 3.1 Trust Board

The Trust Board has a legal responsibility for Trust policies and for ensuring that they are carried out effectively and updated accordingly.

#### 3.2 Patient Safety Group (PSG)

Patient Safety Group meets regularly in accordance with the terms of reference. The Trust Falls Group reports to Patient Safety Group. Patient Safety Group provides advice, support and escalation of information or concerns as necessary in relation to these reports.

#### 3.3 Trust Falls Group

The Falls Group is a formal group of multi-disciplinary colleagues accountable to the Patient Safety Group established to strengthen the delivery of the organisations vision, values, objectives and priorities. The purpose of the Falls Group in relation to bed rails is:

- To review policies and procedures in relation to the use of bed rails and latest national guidance to ensure ongoing updates and improvement.
- To seek assurance from Business Units and Divisions that best practice guidance is effectively implemented across the Trust.
- To collate and disseminate Trustwide learning from incidents involving ineffective or unsafe use of bed rails, particularly incidents where there has been harm.
- To develop and support education, quality improvement work across the Trust around the effective use of bed rails and share the learning Trustwide.

#### 3.4 Medical Equipment Library, Procurement and Clinical Engineering

The Medical Equipment Library Team with Procurement and the Medical Device Engineering teams manage, regulate and support day to day equipment purchasing and

standardisation. The key responsibilities of the Medical Equipment Library in relation to bed rails are:

- Manage bed contracts to ensure all beds comply with MHRA guidance.
- Maintain equipment to ensure this is safe for use.
- Monitor incidents involving bed rails and escalate any concerns to external companies where required.

# **3.5** Divisional Directors, Divisional Nurse Directors, Director of Midwifery and Divisional Medical Directors

In consultation with staff, Divisional Directors, Divisional Nurse Directors, Director of Midwifery and Divisional Medical Directors will ensure implementation of the policy by:

• Monitoring the attendance of staff at mandatory training.

- Providing assurance that staff are aware of the policy.
- Promoting all patient harm incidents involving bed rails are reported via DCIQ (this includes near miss incidents) and promoting a just culture.
- Providing oversight regarding incidents involving bed rails and feedback of relevant learning/information to staff.

#### **3.6 Divisional Governance Teams – Clinical Governance Facilitators and Clinical Governance** Advisors

In consultation with Line managers, Team Leads and clinical staff the divisional governance teams support the implementation of the policy by:

- Promoting all patient harm incidents involving bed rails are reported via DCIQ (this includes near miss incidents), promoting a just culture.
- Having oversight of all incidents involving bed rail usage including ensuring where an incident has resulted in moderate harm or above that duty of candour has been undertaken.
- Supporting staff with investigations after incidents as required.
- Identifying themes from incidents involving bed rails and steering QI work alongside team leads and the patient safety team to address these themes.

#### 3.7 Line Managers, Matrons and Team Leads

Line Managers, Matrons and Team Leads will ensure the implementation of the policy by ensuring:

- Staff are trained, educated and updated in the safe use of bed rails.
- All patient harm incidents involving bed rails are reported and ensure staff understand how and when to report.
- That all moderate/severe harm or death related to bed rails have an investigation/learning completed and actions implemented in line with the Trust Policy for Incident Reporting, Management and Learning.
- That staff participate in clinical audits and actions are taken following these audits.
- That quarterly reports are provided to Falls Group highlighting any concerns about the inappropriate and ineffective usage of bed rails, learning from incidents involving bed rails, ongoing quality improvement work and escalation of any concerns.

#### 3.8 Patient Safety Team

The Patient Safety Team is based within Corporate Nursing and includes falls specialist staff who support clinical areas and staff. The role of the Patient Safety Team is to:

- Contribute to and support the Trust's Falls Group.
- Provide specialist education, training and advice to Trust staff around the safe and effective use of bed rails.

- Review reported incidents of patient harm from ineffective bed rail usage in hospital and work with matrons, governance team and ward managers to identify any themes and assist in steering local action plans.
- Undertake audits within the Trust to ensure compliance with safe use of bed rail policy and identify areas for improvement.
- Provide key visible leadership and to be the subject expert providing advice and support in relation to effective bed rail usage across the clinical/non-clinical workforce.

#### 3.9 Ward Managers/Department Lead/Team Lead

Ward Managers, Department Leads, and Team Leaders will ensure the implementation of the policy by:

- Ensuring that this policy is adhered to in the clinical and non-clinical settings and that there is a clear process for dissemination.
- Ensuring that all patient harm incidents involving bed rail usage including near misses are reported via the Incident Reporting System (DCIQ) in line with the Trust Policy for Incident Reporting, Management and Learning.
- Ensuring that where an incident has resulted in moderate harm or above that Duty of candour is undertaken.
- Leading investigations/learning where a patient has come to harm due to ineffective bed rail usage including the completion of quality improvement work identified through investigation.
- Ensuring wards undertake monthly ward assurance audits across the Trust.
- Monitoring staff mandatory training compliance.
- Promoting accurate and contemporaneous completion of all patient documentation.
- Reporting any faults/concerns regarding beds or bed rail are reported to the Medical Equipment Library.

#### **3.10 All Staff Working with Patients**

- Will undertake mandatory 2-yearly training as required, to maintain their awareness and skill concerning the effective use of bed rails.
- Will report all incidents where patient harm has occurred due to the ineffective use of bed rails via the Incident Reporting System (DCIQ) in line with the Trust Policy for Incident Reporting, Management and Learning.
- Will ensure that all patient documentation is completed accurately and contemporaneously.
- Will adhere to this policy in all clinical and non-clinical settings.
- Escalate any concerns regarding damaged or unsuitable beds or bed rails to the ward sister/department lead or team lead.

#### **4 DEFINITIONS USED**

#### 4.1 Definitions/Abbreviations:

4.1 Demitions/Abbi	criationsi
Fall	An event which results in a person coming to rest inadvertently
	on the ground or floor or other lower level (WHO 2012)
Bed Rail	Rails on the side of the bed incorporated into the design of the
	bed and supplied and fitted with the bed. Can be full length,
	three quarter length or split.
Nominated	Person responsible for ensuring that a review of the bed rails in
Clinician/	use in the community is completed after discharge. This could be
Reviewer	from the Integrated Care Team, Specialist Health Services, Social
	Care (adults or children), or care home representative.
Atypical anatomy	Atypical anatomy is defined by the MHRA as individuals equal to
	or less than 1.46m (4ft 9"), body mass ≤40kg or BMI ≤17
The Trust/	University Hospitals of Derby and Burton NHS Foundation Trust
Organisation	
Hazard	Something that has the potential to cause harm or loss
Risk	The likelihood of harm or loss occurring in defined circumstances
MHRA	Medicines and Healthcare Products Regulatory Agency
Patient Safety	Clinical governance group used to review and escalate learning,
Group (PSG)	issues and or concerns from trends and themes identified from
	Patient Safety, Reporting and Learning, Patient Experience.
	Reviews and escalates as required
PSIRF	Patient Safety Incident Response Framework
DCIQ	The Trust's system used to report and manage incidents, risks
	and complaints
NPSA	National Patient Safety Agency
HSE	Health and Safety Executive
RIDDOR	Reporting of Injuries, Diseases and Dangerous Occurrences
	Regulations 2013

#### 4.2 Definitions of degrees of harm

NPSA has set out definitions for degrees of harm following a fall as below. The Trust has given examples to support with application of these terms.

Level of harm Definition	Examples
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		NHS FO
0. Near miss	Any situation that had the	Water spill in a public place,
	potential to cause harm but was	cleaned up before adverse
	prevented, resulting in no harm	event occurred
1. No Harm	A situation occurred but no	Water spill in public place,
	harm caused	individual falls, but does not
		injure themselves
2. Low Harm	Any unexpected or unintended	Minor treatment is defined as
	incident which required extra	first aid, additional therapy or
	observation or minor treatment	additional medication.
	and caused minimal harm, to	Minor financial loss /
	one or more persons	compensation claim. Minor
		environmental implications.
		Minor loss of reputation. Minor
		service interruption.
		It does not include any extra
		stay in hospital or any extra
		time as an outpatient, or
		continued treatment over and
		above the treatment already
		planned. Nor does it include a
		return to surgery or
		readmission.
3. Moderate	Any unexpected or unintended	Moderate increase in treatment
Harm	incident that resulted in further	is defined as a return to
	treatment, possible surgical	surgery, an unplanned re-
	intervention, cancelling	admission, a prolonged episode
	treatment or transfer to another	of care, extra time in hospital or
	area and which caused short	as an outpatient, cancelling of
	term harm to one or more	treatment or transfer to
	persons.	another area such as intensive
		care as a result of the incident.
		Prolonged pain and/or
		prolonged psychological harm
		which the service user has or is
		likely to experience for a
		continuous period of at least 28
		days.
		uuys.

		NHS Fo
4. Severe Harm	Any unexpected or unintended	Excessive or permanent injuries
	incident which caused	(loss of body parts,
	permanent or long-term harm	misdiagnosis - poor progress
	to one or more persons.	etc). Short term negative
		impact on recruitment and
		retention. High environmental
		implications. Serious financial
		loss, loss of reputation/service
		interruption. Litigation /
		prosecution expected.
		A permanent lessening of
		bodily, sensory, motor,
		physiological or intellectual
		functions including removal of
		the wrong limb or organ, or
		brain damage that is related
		directly to the incident and not
		related to the natural course of
		the service user's illness or
		underlying condition.
		A patient/staff/visitor who has
		fractured a hip (including
		pathological fracture) from a
		fall is unlikely to regain the
		levels of mobility and
		independence they had prior to
		the fall.
		A patient/staff/visitor who has
		a sub-dural haematoma or
		subarachnoid haemorrhage
		from a fall, is unlikely to regain
		the levels of mobility an
		independence that had prior to
		the fall.
5. Death	Any unexpected or unintended	The death must relate to the
	incident which caused the death	incident rather than to the
	of one or more persons.	

natural course of the patient's
illness or underlying condition.
Death, toxic-off site release
with detrimental effect,
national adverse publicity,
affects large numbers of people
(i.e. cervical screening disaster).

#### **5 SAFE USE OF BED RAILS IN PAEDIATRIC INPATIENT SETTINGS**

#### 5.1 Safe use of bed rails in paediatric inpatient areas

Decisions about bed rails are only one small part in the prevention of falls. It is advisable to refer to the Trust Policy and Procedure for the Prevention and Management of Patient Falls to identify other steps that should be taken to reduce a child's risk of falling.

All paediatric patients should be cared for on beds with 5 bars to reduce the risk of entrapment between the bars.

Bed rails **should be** in use:

- When the child is being transported on their bed/trolley.
- In areas where the child is recovering from anaesthetic or sedation and is under constant supervision.
- The child is being cared for in cot.

Bed rails **should not be** in use if:

- The child is agitated or confused and may climb over the bed rails.
- The child is found attempting to climb over the bed rail. This should be taken as a clear indication that they are at risk of serious injury from falling from a greater height.
- The child is independent enough to transfer or mobilise if the bed rails were not in place as this could be deemed as restraint.
- The child is found in positions which could lead to bed rail entrapment, for example, feet or arms through rails or halfway off the side of their mattress. This should be taken as a clear indication that they are at risk of serious injury from entrapment.
- There are signs of significant damage or faults to the bed rail.

The use of bed rails is a balance of risk. This risk will vary for individuals depending on their physical/mental health needs and the environment. Staff should use their clinical judgement alongside evidenced based best practice to weigh up the risks and benefits of using bed rails with each individual and only use bed rails where the benefits outweigh the risks. Additional consideration should be given to patients with:

• communication problems



- confusion, agitation or delirium
- learning disabilities
- repetitive or involuntary movements
- larger or smaller than average body size (which may change entrapment risks)
- impaired or restricted mobility
- variable levels of consciousness, or those under sedation
- sensory impairment

Children who require the use of bed rails but are at risk of striking their limbs on the bed rails should have bumpers applied to the bed. These should be purchased by the ward via NHS Supply Chain.

Every effort should be made to explain to the individual / relatives / carers the potential risks of using bed rails as well as measures taken to reduce their risk of falls and entrapment.

#### 5.1.1 Documentation

The decision to use or not use bedrails should be recorded within the bed rails risk assessment documentation (see Appendix 1) and any variances should be documented fully. All children should be assessed on admission and thereafter reassessed weekly, if their condition changes or the child is transferred to different area in the Trust.

Children who experience an inpatient fall from bed should have their bed rail assessment and bed height reviewed as part of the post falls care.

#### 5.1.2 Use of bed rails with children with atypical anatomy

Children with atypical anatomy are at increased risk of bed rails entrapment. Atypical anatomy is defined by MHRA (Aug 2023) as adults  $\leq$  146cm (4ft 9") or  $\leq$  40kgs or a BMI  $\leq$  17.

Any children that meet these criteria should be cared for on a bed meeting standard BS EN 50637:2017 unless there is a reason for using a noncompliant bed, which should be documented. Currently the Trust has no beds that are compliant with this standard, therefore, these children should have a risk assessment (see Appendix 1) completed as soon as reasonably practical and bed rails should only be used with clear clinical reasoning.

#### 5.1.3 Use of bed rails with children being cared for in cots

Children under 2 years of age should be cared for in cots. Cot rails should be in use at all times unless direct clinical care is being provided.

#### 5.2 Safe use of rails on trolleys in paediatric departments

In paediatric emergency departments and wards children may be cared for on trolleys. The paediatric assessment for use of trolley rails should be completed in these departments (see Appendix 2).

For children being cared for on trolleys rails should be always in place as due to the narrowness and height of trolleys, rails are considered necessary to prevent serious injuries from falls.

To reduce the risk of falls and entrapment:

- Trolleys should be set at the lowest setting unless direct care is being given.
- If available, suitable bumpers should be used.
- Information should be given to child/relative/carer around the safe use of trolley rails.
- Child/relative/carer should be advised to ask for support before moving from trolley.
- All children being transferred to other departments/wards, such as x-ray, will require an escort to reduce the risk of entrapment or falls over the rails.
- Children assessed as high risk of entrapment who are being cared for on a trolley should be continually observed by staff or relatives/carers.

#### 6 PROVISION OF BED RAILS FOR SAFE DISCHARGE INTO THE COMMUNITY

#### 6.1 Supplying bed rails to patients residing in Derbyshire

For hospital discharges where bed rails are recommended for use, the process outlined in the 'Joint Derby and Derbyshire Health & Social Care Policy for the Safe Use of Bed Rails and Bed Area Equipment in the Community' should be referred to and followed. This includes discharges where the patient already has bed rails in place at home and it is assessed that this remains appropriate. This policy can be found via KOHA.

In line with this policy prior to discharge a risk assessment must be completed within the inpatient setting and documented (see Appendix 5 and 6). Following supply of bed rails a 72-hour review should be undertaken in the community by a nominated clinician/reviewer (see Appendix 7). It is the responsibility of the health professional arranging discharge to communicate with the nominated clinician/reviewer who will be completing the 72-hour review assessment and record their details on the risk assessment form (see Appendix 5 and 6).

A copy of the risk assessment should be given to the individual/carer and another copy should be forwarded to the nominated clinician/reviewer for review. All information given to the individual/carer/agency must be documented.

#### 6.2 Supplying bed rails to patients residing in Staffordshire or out of area

For hospital discharges where bed rails are recommended for use, including discharges where the patient already has bed rails in place at home and it is assessed that this remains appropriate, a risk assessment should be completed (see Appendix 8). A copy of the risk assessment should be given to the individual/carer and another copy should be forwarded to the appropriate community service for ongoing review and support. After discharge the discharging clinician should complete a post installation review within 72 hours of discharge to ensure bed rails have been safely fitted and remain appropriate for the patient. This review can be completed via phone, video technology or face to face. The method of review should be clinically reasoned dependent on individual patient circumstances and outcome recorded in patient record.

#### 7 INCIDENT/SAFEGUARDING REPORTING

Any incidents where there was potential for patient harm or patient harm occurred due to the use of bed rails should be reported via DCIQ in line with the Trust Policy for Incident Reporting, Management and Learning. If a moderate, severe harm or death incident occurs due to the use of bed rails this should be reported as a RIDDOR incident via DCIQ.

NHS 'Never Events' are defined as 'serious, largely preventable patient safety incidents that should not occur if the available preventative measures have been implemented by healthcare providers. NHS 'Never Events' number 11 (1) covers chest or neck entrapment in bed rails. Should a 'Never Event' occur due to bed rails this should be reported and immediately escalated in line with the Trust Policy for Incident Reporting, Management and Learning.

#### 8 SUPPLY, MAINTENANCE AND CLEANING

MHRA (Aug 2023) recommend two international standards for medical beds which include requirement for acceptable gaps in order to reduce entrapment risks:

- BS EN 60601-2-52:2010+A1:2015 is the standard for adult beds (Appendix 3).
- BS EN 50637:2017 for medical beds and cots for children and adults with atypical anatomy (Appendix 4).

The Trust has taken steps to comply with MHRA advice through ensuring that:

- beds and their integral bedrails are regularly maintained.
- types of bedrails, beds and mattresses used on each site within the Trust are of compatible size and design, and do not create entrapment gaps for adults within the range of normal body sizes.
- there is sufficient stock to ensure mitigations for atypical anatomy patients and children can be provided.

 scoping of new products that meet standard BS EN 50637:2017 will be completed regularly to ensure the Trust are considering purchase of compliant beds when appropriate products become available.

Any signs of damage, faults or cracks on the bedrails or bed rail release mechanism should be immediately reported to the medical equipment library and the bed should be taken out of use. Bed rails should not be adapted/altered by staff and any requested adaptations should be reviewed to ensure they are in line with the manufacturer's safe usage guidance.

Bedrails should be cleaned as instructed as part of the routine bed cleaning list. Visible contamination of the rails should be cleaned with detergent and hot water or detergent wipes ensuring that universal precautions are followed and should be undertaken in accordance with the Infection Prevention and Control - UHDB Trust Policy and Procedure.

Monitoring Requirement:	Compliance with policy		
Monitoring Method:	Falls training compliance		
	Audit and thematic analysis of incident data		
	Business unit reports presented to falls group		
	Ward assurance audits		
	Essential to role training for prescribers of community		
	bed equipment		
Report prepared by:	Senior Falls Practitioner		
Monitoring report	Patient Safety Group		
presented to:			
Frequency of report:	Patient Safety Group – bimonthly		

#### 9 MONITORING COMPLIANCE AND EFFECTIVENESS

#### **10 REFERENCES**

- Medicines and Healthcare Regulatory Agency (2023) Bed rails: management and safe use. <u>Bed</u> rails: management and safe use - GOV.UK (www.gov.uk)
- Medicines and Healthcare products Regulatory Agency. National Patient Safety Alert (Aug 2023) Medical beds, trolleys, bed rails, bed grab handles and lateral turning devices: risk of death from entraptment or falls. <u>NatPSA bed rails 30 8 23.pdf (publishing.service.gov.uk)</u>
- Health and Safety Executive (2012) Safe use of bed rails. <u>Health Services Safe use of bed rails</u>
- Health and Safety Executive (2012) Sector Information Minute (SIM 07/2012/06) Bed rail risk management. <u>Sector Information Minute (SIM 07/2012/06)</u>... (hse.gov.uk)
- Never Events List 2018. NHS England (revised February 2021), NHS England » Never events



**APPENDIX 1 - Paediatric Bed Rail Risk Assessment** 

#### UNIVERSITY HOSPITALS DERBY AND BURTON NHS FOUNDATION TRUST

	Assessment for use of bed rails in paediatric settings					
Complet	te the appropriate s	ection of the risk a	ssessme	nt for All n	atients	
	essment should be					transfer
	be completed more			eekiy/onang	ge of condition/on	uansier.
This car	r be completed mon	e nequentry in requ	aneu.			
11			1			
Patie	ent Demographic S	Sticker				
	2 1					
11						
Assess	ment for child beir	o cared for in a l	bed:			
Bed rails	s must always be in	place during trans	sport.			
Only be	ds with 5 bars shoul	d be used in paed	liatric sett	ings.		
Deec the	a shild most ony of	the high righ eriter	ia:			
Does in	e child meet any of	ine nign-risk criter	ia.			
🗆 BM	ll 17 or less			The child is	confused or agita	ited
🗆 Hei	ight 146cms or less			The child h	as previously atter	moted to
	0				ed rails or has bee	
□ We	ight 40kgs or less					
			with i	imps betwe	en or over the bar	s
	NO				YES	
					1 LO	
			- <b>с</b>			- 1
				Child is de	eemed high risk of	
				er	ntrapment.	
			- I			
	DO NOT USE BED RAILS					
			· · · -			
	*					
	OT USE BED RA	LS unless the ch	nild is reco	overing from	n sedation/anaest	hetic and
	er constant supervis					
	er oonstant supervis					
Pleas	e ensure:					
•	Bed is set at the o	ptimal height for s	afe transf	ers		
	Child / relative or o				ort before moving	from hed
11 -		arer has been au	viseu to a	ak for adpp	on before moving	nom bed
11	if required					
• •	Information has be	en given to patien	t / relative	e or carer a	round safe use of	bed rails
11						
	s clear clinical reas					nt, please
	locument this below					
			_	,	<i>a</i> .	
Date	Red re	ils in use		Name	Signature	Job role
Date				Name	Signature	3001012
	YES					
	YES	NO				
	YES	NO				
	YES					
<u> </u>	YES					
	IES	NO			1	

#### UNIVERSITY HOSPITALS DERBY AND BURTON NHS FOUNDATION TRUST

Date	If there is clear clinical reasoning as to why the rails are in use that is not covered by the risk <u>assessment</u> please document	Name	Signature	Job role

#### Assessment for child being cared for in a cot:

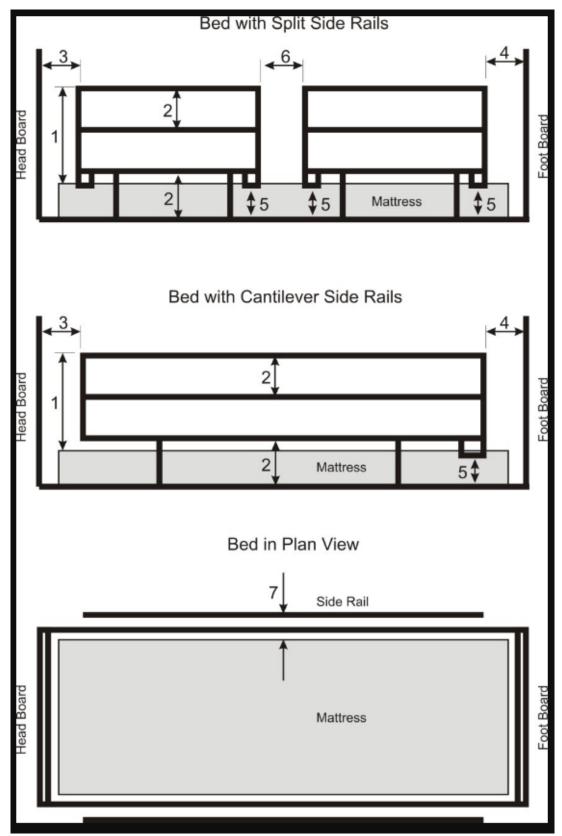
Cots should be used for children under 2 years old. Cots rails should always be up. These should only be lowered when needed for direct patient care.

Date	Signature	Name	Job Role	Child is being cot with rs	cared for in a ails in use
				YES	NO
				YES	NO
				YES	NO
				YES	NO
				YES	NO

#### **APPENDIX 2 - Paediatric Trolley Rail Risk Assessment**

UNIVERSITY HOSPITALS DERBY AND BURTON NHS FOUNDATION TRUST

Asse	essment for	use of t	trol	ley	rai	ils in paediatric s	Assessment for use of trolley rails in paediatric settings				
Complete the risk assessment for ALL patients. This assessment should be completed on admission / change of condition / transfer. This can be completed more frequently if required.											
Patient Demographic Sticker Please note trolley rails must always be in use during transportation.											
Does the child mee	t any of the high	n-risk criter	ia:								
BMI 17 or less				1		The child is confused	or agitated				
Height 146cm	s or less			1		The child has previou	sly attempted to				
Weight 40kgs	or less					b over the rails or has between or over the					
	NO		F			YES					
Keep trolley rails in upright position but consider the following mitigations: Tick appropriate mitigations used				<u>but</u> miti	<u>co</u> ga	trolley rails in uprig nsider the following tions: propriate mitigations u	1				
□ Trolley is set at	the lowest settir	ng		Child is being continually supervised							
Child / relative of				□ Suitable bumpers are in use if available							
advised to ask for from trolley	support before	moving		ПТ	olle	ey is set at the lowest :	setting				
□ Information has been given to patient / relative or carer around safe use of trolley rails □ Child / relative or carer has been advised to ask for support before moving from trolley											
□ Suitable bumpers are in use if available				relat		mation has been given or carer around safe u					
□ Child is fit to sit and has been moved to a chair				rails □C a.ch		l is fit to sit and has be	en moved to				
Ward / Department	Date	Nan	ne			Signature	Job role				



APPENDIX 3 - Bed rail dimensions in BS EN 6061-2-52:2010+A1:2015 NPSA (Aug 2023)

Description	Diagram Reference	BS EN 60601-2- 52:2010	Notes
Height of the top edge of the side rail above the mattress without compression	1	≥ 220mm	Where a speciality mattress or mattress overlay is used and the side rail does not meet ≥ 220mm a risk assessment shall be performed to assure equivalent safety
Gaps between elements within the perimeter of the side rail and between the side rail and mattress platform	2	< 120mm	
Gap between headboard and end of side rail	3	< 60mm	Most disadvantageous angle between headboard and side rail
Gap between foot board and end of side rail	4	< 60mm OR > 318mm	Most disadvantageous angle between foot board and side rail
Distance between open end of side rail(s) and mattress platform	5	< 60mm	The gap between the open end of the side rail and headboard is not relevant to this position reference

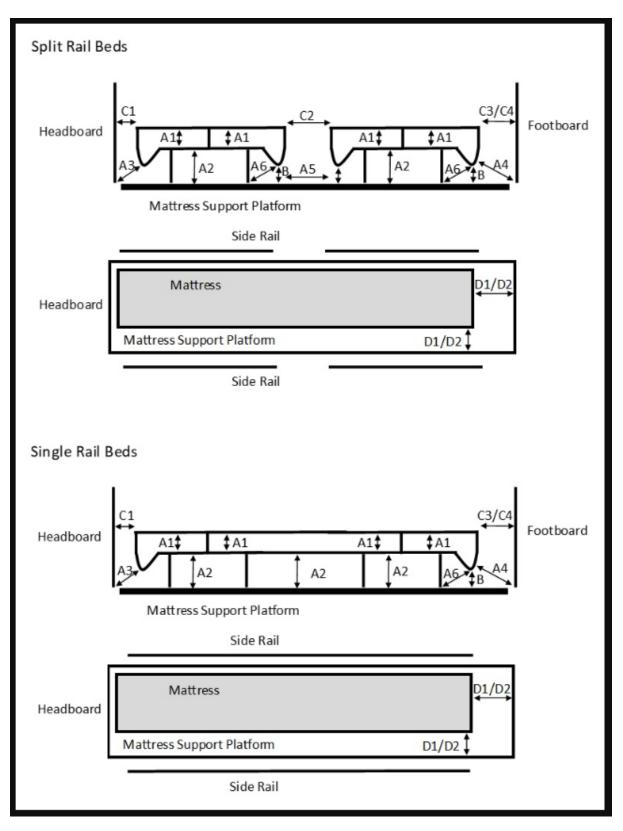
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Gap between split side rails	6	< 60mm OR > 318mm	When in most disadvantageous position
Gap between side rail and mattress in 'plan' elevation	7	Perform test	120mm aluminium cone is positioned between mattress and side rail to determine if gap is acceptable or not.

Note that compliance to this standard requires the use of specific measurement tools, rather than basic distance measurements alone. It is intended to be used by manufacturers. For this reason, it is recommended that end users do not use solely these measurements as the sole basis for evaluating suitability of a bed rail installation.

#### APPENDIX 4 - Bed Rails Dimensions BS EN 50637:2017

NPSA (Aug 2023)



Description	Diagram Reference	BS EN 50637:2017	Notes
Fully enclosed openings within a side rail, head/foot board, mattress support platform	A1	<60mm	
Fully enclosed opening defined by the side rail, its supports and the mattress support platform	A2	<60mm7	
Partially enclosed opening defined by the head board, mattress support platform and side rail	A3	<60mm	
Partially enclosed opening defined by the foot board, mattress support platform and side rail	A4	<60mm	Except when gap between side rail and foot board is >300mm
Partially enclosed opening between segmented or split side rail and the mattress support	A5	<60mm	Except when gap between side rails is >300mm
Partially enclosed opening defined by lowest point of a side rail, the adjacent side rail support and mattress support	A6	<60mm	

			NHS Founda
platform, to the outside of the side rail supports			
Other openings defined by accessories (e.g. IV poles, fracture frames) and side rails, head or foot boards and or mattress support platform. Not shown in figures.	A	<60mm	
Distance between mattress support platform and the lowest point of the side rail outside the side rail support AND The angle between the side rail and mattress support platform at the range of the mattress height defined by the manufacturer ± 2 cm	В	<40mm AND Angle between mattress support platform and side rail interface >75° over the entire range of mattress heights from minimum recommended height minus 2 cm to the maximum recommended mattress height plus 2 cm.	
Gap between head board and adjacent side rail	C1	<40mm	
Gap between segmented or split side rails with both side rails raised	C2	<40mm OR >300mm	For a gap >300mm: the gap shall be >300mm or

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			Derby and NHS Foundation
			<400mm for the entire vertical distance
For all medical beds except junior beds: gap between side rail and foot board. Other openings defined by accessories (e.g. IV poles, fracture frames etc.) and side rails, head board, foot board, and or mattress platform	C3	<40mm	
For junior beds: gap between side rail and foot board. Other openings defined by accessories (e.g. IV poles, fracture frames etc.) and side rails, head board, foot board, and or mattress platform	C4	<40mm OR >300mm	For a gap >300mm: the gap shall be >300mm or <400mm for the entire vertical distance
Region defined by side rail/head board/foot board and the mattress for cribs and cots	D1	Perform test	Cone tool does not sink below the mattress surface by 50% or more of its 60mm diameter.
Region defined by the side rail/head/foot board and the mattress for junior beds and oversize cots	D2	Perform test OR Gap between side rail/head/foot board and mattress <30mm	Cone tool does not sink below the mattress surface by 50% or more of its 60mm diameter.

<u>APPENDIX 5 - Bed Rails Initial Assessment Form (Appendix within Joint Derby and Derbyshire Health & Social Care Policy).</u>



#### **BED RAILS INITIAL ASSESSMENT FORM – STAGE 1**

SURNAME:	FORENAME:	DOB:
NHS NUMBER:	FRAMEWORK I NO:	GP:

A COPY MUST BE KEPT IN THE PERSON'S RECORDS/CARE PLAN AND A COPY TO ACCOMPANY THE PERSON

#### INITIAL ASSESSMENT

Check and tick ( $\checkmark$ ) the following	Yes	No
1. Is the person at risk of falling out of bed?		
Rationale:		
2. Deep the person independently transfer out of hed?		
<ol><li>Does the person independently transfer out of bed? Rationale:</li></ol>		
3. Does the person have the potential to climb over the top of the bed		
rails or out		
of the bottom of the		
bed?		
Rationale:		
4. Does the person's movement pose a risk, e.g. spasm, balance etc?		
Rationale:		
5. Does the person's current behaviour present a risk, e.g. confusion,		
agitation, challenging behaviour, self-injurious behaviour, lack of awareness of		
potential		
damage?		
Rationale:		
6. Does the person's physical size present a risk, e.g. entrapment of		
any part of		
the body?		

				NHS	Foundat
Rationale:					
<ol> <li>Does the person have a complex medi syndrome, osteoporosis, epilepsy, disk Rationale:</li> </ol>		-			
8. If provided is the person likely to use turning, sitting up? Rationale:	the bed rails	for suppo	orting,		
Check and tick ( $\checkmark$ ) the following				'es	No
9. Is the person left unsupervised and d they raise help? Rationale:	loes this pose	a risk? i.e	-		
10. Is there any other relevant information e.g. historical information, sensory needs etc. Rationale:					
11. Following this assessment are bed r risk to the person? (Provide rationale if any answ outside of the grey box) Rationale:	wer is				
12. Have alternative methods of bed management been considered? Rationale:					
13. Has the patient or family requested th Rationale:	ne provision of	bed rails?			
14. Does the patient require bed rail bum Rationale:	pers to reduce	risk?			
15. Are mattress infills required? Rationale:					
16. Where will the bed rails be used? (please tick)	Residential Home	Nursing Home	Own Home	Othe	r
Type of bed:	Type of rail:	<u> </u>	<u> </u>		

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Bed rails to be fitted? (please tick)	Yes	No				
If no please detail any alternative methods:						
Assessors Name:	Designation:					
Signature:	Date /Time:					
Remember to email a copy of the form	to the Autho	oriser				
72 hour review to be completed by:						
Reviewer:	Team:					
Tel. No Base:						
For any transfer of care, the prescriber must ensure that a nominated clinician accepts						
the referral for the 72 hour review.						

<u>APPENDIX 6 - Guidance notes for completion of the bed rails and assessment tool - stage 1</u> (<u>Appendix within Joint Derby and Derbyshire Health & Social Care Policy</u>).

#### <u>GUIDANCE NOTES FOR COMPLETION OF THE BED RAILS AND</u> <u>ASSESSMENT TOOL – STAGE 1</u>

The following questions relate to the Assessment and Review Tools, Appendix 4. **Person Details** 

- Person details to be filled in fully and clearly.
- Those involved in the assessment, including verbally, should be recorded.

#### Question 1: Is the person at risk of falling out of bed?

- Has the person fallen out of bed recently or is anxious that they may fall out of bed if sleeping in a different bed e.g.' single bed?
- Is the person aware of their limitations and mobility including bed mobility?
- New condition affecting balance, e.g. amputee, etc.
- Can the person role / slide down the bed?

#### Question 2: Does the person transfer independently out of bed?

• Will the use of bed rails prevent independent transfers? Does the person require a bed lever or bed stick to assist with independent transfers?

# Question 3: Does the person have the potential to climb over the top of the bed rails or out of the bottom of the bed?

• If the answer is "Yes" bed rails *must not* be used.

#### Question 4: Does the person's movement pose a risk?

For example, spasm, balance, epilepsy, involuntary movements, etc.

# Question 5: Does the person's current behaviour present a risk, e.g. confusion, agitated and challenging behaviour?

- Could the use of bed rails or bed equipment impact on behaviour that could injure the person/carer, result in entrapment or cause stress or anxiety to the person?
- What needs to be taken into account considering behaviour?

# Question 6: Does the person's physical size present a risk, e.g. entrapment of any part of the body in the rail or bed equipment?

 Bed safety sides are designed for use with all peoples over the age of 12. Therefore, they may not be suitable for use with children and adults with atypical anatomy (under 146cm in height or less than 40Kg in weight or BMI less than 17). A clinical judgement must be made as to whether the use of bedrails is appropriate and whether equipment meeting BS EN 50637:2017 is required. Please see the policy, with reference to appendix 16, for further information.

#### Question 7: Does the person have a complex medical Condition?

Detail any relevant medical history or diagnosis that will have an impact on the use of bedrails

Are there any issues posed by providing bed rails or bed equipment, e.g. rehabilitation, catheter, ventilator, gastrostomy, tubes, etc.?

• Are the other equipment / attachments / medical devices compatible with the chosen option?

# Question 8: If bedrails are being considered, is the person likely to use them for supporting or turning / sitting up?

- Standard bed rails should not be provided for this purpose. However some manufacturers now produce bedrails that can be used to assist turning as well as safety. Seek guidance from the manufacturer
- Seek alternative equipment using manufacturer's guidance, e.g. bed levers

#### Question 9: What is the longest period the person is left unsupervised?

- Does this pose a risk?
- Is there adequate monitoring of the person whilst bed rails are in use?

# Question 10: Is there any other relevant information re the use of bedrails or other bed area equipment, e.g. historical information, sensory needs, existing bed area equipment etc.

Question 11: Following this assessment are bed rails suitable for reducing the risk to the person? (Provide rationale if any answer is outside of the grey box)

#### Question 12: Have alternative methods of bed management been considered?

- Have alternative methods been considered, e.g. crash mats, low beds, sensory devices, etc.?
- Is this compatible with chosen method?

#### Question 13: Has the patient or family requested the provision of the bed rails?

• Consider the views of the patient and family.

#### Question14: Does the patient require bed rail bumpers to reduce risk?

#### Question 15: Are mattress infills required?

#### Question 16: Where will the bed rails be used?

• Tick the relevant box.

#### Complete type of bed and rail.

#### Confirm bed rails to be fitted.

#### Assessor to sign, date etc.

# <u>Complete responsible person for the 72 hour review. Ensure person accepts</u> referral for the review if not the prescriber.

<u>APPENDIX 7 - Bed rails post installation 72 hour assessment - stage 2 (Appendix Joint Derby</u> and Derbyshire Health & Social Care Policy).



## **BED RAILS POST INSTALLATION 72 HOUR ASSESSMENT – STAGE 2**

SURNAME:	FORENAME:	DOB:
NHS NUMBER:	FRAMEWORK I NO:	GP:
HEIGHT:	WEIGHT:	BMI:

To be completed on immediate initial review by the main carer, e.g. community nurse, therapist or social care.

BED RAIL TYPE: (Check and tie	ck ( ✓ ) th	e followi	ing)		
	Yes	No		Yes	No
Integral	х		Split		
Mesh Sides			Inflatable		
Concertina			Bed Side Wedges		
Universal High Rail			Other (please state)		
Has safety issues been discussed with the person / carers? Please confirm what has been discussed:					
<ul> <li>Risk of entrapment or rolling against the rails discussed. Risk of climbing over rails. contact Medequip if any concerns with bed rail use.</li> <li>ARE THE BED RAILS: (Check and tick ( ✓ ) the following)</li> </ul>					tO
				Yes	No
	tick ( ✓ )	the follo	wing)	Yes	No
ARE THE BED RAILS: (Check and	tick ( ✓ ) ve move	the follo ment?	wing)	Yes	No
ARE THE BED RAILS: (Check and A. Fitted securely, with no excession	tick ( ✓ ) ve move no rust, ccording	the follo ment? loose f	wing) fixings or cracks to joints? oplier's instructions?	Yes	No



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Consider are there no gaps that could present an entrapment risk: (reference MHRA guidance and pictures attached)		
<ol> <li>Height of the top edge of the side rail above the mattress without compression should be greater than 220 mm. (240mm)</li> <li>Gap between elements within the perimeter of the side rail and between the side rails and mattress platform must be less than 120</li> </ol>		
mm. Gap between mattress platform and bottom of side rail must be less than 120 mm.		
<ol> <li>Gap between the headboard and end of the side rail must be less than 60mm.</li> </ol>		
<ol> <li>Gap between the footboard and end of side rail must be less than 60mm or greater than 318 mm.</li> </ol>		
<ol><li>Gap between the mattress platform and lowest part of the side rail must be less than 60 mm.</li></ol>		
<ol><li>Gap between split side rails should be less than 60 mm or greater than 318 mm.</li></ol>		
<ol> <li>Visual check between mattress and side rail to determine if there is a gap that could pose an entrapment risk to head, limbs etc.</li> </ol>		
E. Appropriate for the person?		
F. High enough to take into account any increased mattress thickness or additional overlay? Standard foam mattress provided. Air or hybrid mattress may affect bed rails meeting criteria.		
G. Compatible with other equipment? (e.g., lateral turning device, sleep system etc.)		
The desired outcome for all the questions above is 'Yes' if you answer "No" to any o may be risks in using this equipment, review immediately and outline the planned a	•	
BUMPERS: (Check and tick ( ✓ ) the following) H. Are bumpers required?		No
If "No" go to next section, if "Yes" continue below: I. Compatible with the rails? Provided and fitted by medequip technician.		
J. Sufficiently padded?		
If you answer "No" to question I or J, outline the planned action below:		

## NHS

		Densy and Darton						
		NHS Four	ndation Tru	ust				
If changes have been made to the initial installation, is a further post installation assessment needed?		Yes	No					
If applicable who has accepted the referral to complete this? (Details):								
Assessment completed by:								
Name and Designation	Team							
Tel. No.	Base							

## MHRA BEDRAIL GUIDANCE

#### Diagram of side view of bed with split rails

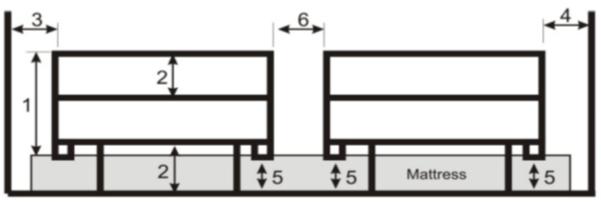
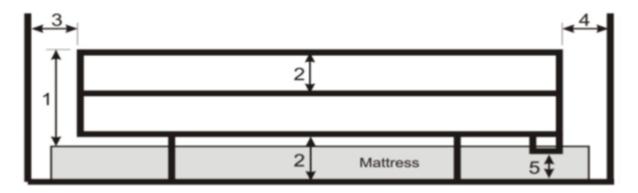
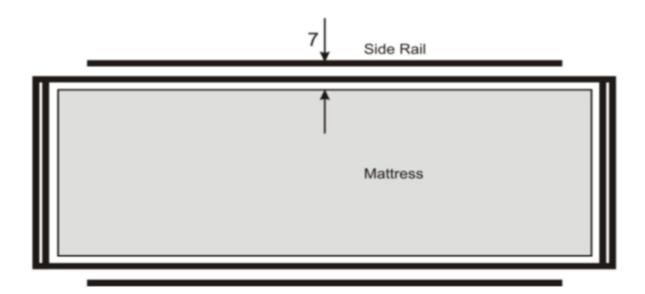


Diagram of side view of bed with cantilever side rails



#### Diagram of bed aerial view



#### APPENDIX 8 - Bed Rails Risk Assessment - Staffordshire or out of area

#### Bed Rails Risk Assessment – Staffordshire/Leicestershire

#### **Bed Rail Risk Assessment Checklist**

1. This checklist must be completed by a trained member of staff from the relevant clinical team to decide if bed rails are actually required or if an alternative method should be used to reduce to reduce the risk of falls and potential injury.

2. This assessment should be used in conjunction with the Trust's Safe Use of Bed Rails Policy and with the nurses/therapists own professional/clinical judgement.

3. Bed rails should only be used to prevent people from falling out of bed, not to assist patient moving and handling or transfers.

4. It is important to determine if alternative equipment may be more suitable i.e., are bed rails actually required?

5. This assessment must be carried out before bed rails are used and once fitted, must then be followed up by the Bed Rail Review Checklist (Appendix 2).

6. The Bed Rail Review Checklist (Appendix 2) must also be completed after each significant change in the patient's condition, after alterations to any part of the equipment combinations or after any incident involving bed rails.

7. Beds should always be returned to the lowest possible height when carers/staff are not in attendance and where applicable, the bed height activator must be locked.

8. Bed rails must always be issued and fitted in pairs.

9. Bed rails will not be issued for divan beds.

10. Bed rail bumpers/pads will be supplied at the request of the referrer.



#### **Bed Rail Risk Assessment**

Patient Name: Address: NHS Number:

Date: Type of bed:

1. Does the patient need to get out Yes No of bed unsupervised? e.g., to use the toilet. The provision of bed rails may impede independence

2. Does the patient have any of the Yes No following: dementia, a learning disability, confusion, delusions, partial paralysis, abnormal or involuntary movement, unpredictable behaviour? If 'Yes', please specify:

#### 3. Is the patient currently at risk of falling from their bed? Yes No

#### 4. Is the patient likely to climb over the bed rails?

An injury's severity could be increased if a person climbs over a bed rail and falls from a greater height. Patients who are confused and have enough strength and mobility to clamber over the bed rails are most at risk **Yes No** 

#### 5. Is the patient able to understand the purpose of bed rails? Yes No

#### 6. Are the bed rails to be used with a typically sized adult patient? Yes No

## 7. Depending on mattress(es) being used, are standard height bed rails sufficient?

If 'No', consider the use of extra height bed rails or an alternative mattress. Yes No

#### 8. Is the carer able to raise/lower the bed rails?

(Consider who would do this).

N.B. Not applicable to Community Hospitals.

#### 9. Could the patient injure themselves on the bedrails?

Bed rails can cause injury if the patient knocks themselves on them or traps any body parts between them. The most vulnerable patients are those with uncontrolled limb movements, who are restless / confused or have fragile skin.

Bed rails even when fitted correctly carry the very rare risk of postural asphyxiation. Those who are frail, restless or confused are most at risk.

Would bed rail bumpers reduce the risk of entrapment / injury

## 10. Has the safe use and potential risks of bed rails been discussed with the patient/next of kin? Yes No

#### 11. Has the assessment been discussed with the patient/next of kin? Yes No

#### 12. Does the patient/next of kin agree with the assessment?

If 'Yes' to questions 1 or 2 then consider alternatives as the risk of entrapment is likely to be increased. If 'Yes' to questions 3 - 12 then the use of bed rails may be indicated. If a 'No' box has been ticked then alternatives should be considered as bed rails are possibly not required and there may be a potential entrapment risk. (**Note**: this does not apply to questions 1 and 2). Alternative solutions are discussed in the Safe use of Bed Rails Policy.

## Bed rails to be used? Yes / No Justification:

Name of Assessor: Base: (in full, printed) Signature: Tel No: Designation: Date:

KEEP WITH PATIENT'S NOTES As required by the Clinical Record Keeping Policy