Shropshire Community Health
NHS Trust

Document Details	
Title	Transmission-based Precautions (Isolation) Policy
Trust Ref No	760-82900
Local Ref (optional)	
Main points the document covers	This policy provides guidance on source and protective isolation practices to minimise the risk of transmission of infection between patients, staff, and visitors.
Who is the document aimed at?	All staff who work in a clinical environment throughout the Shropshire Community Health NHS Trust
Author	Associate Director of Infection Prevention and Control
Approval process	
Who has been consulted in the development of this policy?	This policy has been developed by the IPC Team in consultation with appropriate senior Operations and Quality managers, Locality Clinical Managers, Specialist Nurses, Medicines Management and Public Health England
Approved by (Committee/Director)	Infection Prevention and Control Committee
Approval Date	21 June 2023
Initial Equality Impact Screening	Yes
Full Equality Impact Assessment	N/A
Lead Director	Director of Nursing and Allied Health Professionals Director for Infection Prevention and Control
Category	Clinical
Sub Category	Infection Prevention and Control
Review date	21 June 2026
Distribution	
Who the policy will be distributed to	IPC Operational Group Meeting Members
Method	Electronically to IPC Operational Group Meeting Members and available to all staff via the Trust website
Document Links	
Required by CQC	Yes
Keywords	Isolation, PPE, diarrhoea, vomiting, infection

Amendments History		
No	**Date**	**Amendment**
1	December 2022	Developed Transmission-Based (Isolation) Policy to replace Isolation Policy

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Assessment

- The potential for transmission of infection must be assessed promptly when a patient enters a care area. If hospitalised, this should be continuously reviewed throughout the period of care. The assessment will influence patient placement decisions in line with clinical/care need(s) and must be documented.
- Patients who may present a cross-infection risk includes those:
    - with diarrhoea, vomiting, an unexplained rash, fever or respiratory symptoms
    - known to have been previously positive with multidrug-resistant organisms (MDRO) e.g. Meticillin-Resistant Staphylococcus aureus (MRSA), Carbapenemase-Producing Enterobacteriaceae (CPE).

Transmissible Infection Prevention control (TIPC) Precautions

- TIPC Precautions must be applied in addition to Standard infection Prevention Control (SIPC) Precautions.
- There are 3 types of TIPC Precautions:
    - Contact Precautions
        - Note for patients with diarrhoea or GI infections, enteric contact precautions are to be used. This entails the sole use of soap and water to clean hands after contact with the patient or their immediate environment and a chlorine releasing agent to be used to decontaminate the environment and equipment.
    - Droplet Precautions
    - Airborne Precautions
- Some organisms or conditions may require a combination of the above precautions
- If transmissible precautions are required, the patient must be placed in a sideroom.
- If there are insufficient side rooms, a risk assessment must be conducted to identify priority for the sideroom. This should be done in consultation with the IPC Team or Microbiology outside of normal office hours.
- If more than one patient has the same condition, infection or microorganism, a cohort of patients may be placed within the same area or bay with the precautions applied to each individual patient
- The sideroom door must be kept closed unless a risk assessment suggests otherwise
- Equipment should be dedicated for the sole use by the patient in isolation when possible. For example, observation equipment should be for the sole use, a hoist may be shared providing itis appropriately decontaminated between use. The sling may be retained for the sole use of the isolated patient.
- PPE including mask, gloves and face protection must be available outside the room. For PPE required see Appendix 1. Gloves will have to be brought into the room if required to carry out a procedure, for example a change of dressing.
- Linen and waste must all be treated as infectious.
- Equipment and the environment must be cleaned and disinfected in line with the Trust's policies
- The patient must be informed of the reason why they are being placed in a sideroom with transmissible precautions and where available a leaflet provided. The information given should be documented in the patient's notes.

1 Introduction

The policy of the Trust is based on the national guidelines contained within the National Infection Prevention and Control Manual for England. Refer to the national IPC guidelines here: C1691-National-infection-prevention-and-control-manual-v-2-3-28102022.pdf (england.nhs.uk)

Standard infection control precautions (SICP) may be insufficient to prevent cross transmission of specific infectious agents and additional precautions called "transmission-based precautions" (TBP) may be required when caring for patients with known / suspected infection or colonisation.

Transmission based precautions are categorised by the route of transmission of infectious agents (some infectious agents can be transmitted by more than one route).

Clinical judgement and decisions should be made by staff on what additional precautions are required and this will be based on:

- suspected/known infectious agent
- severity of the illness caused
- transmission route of the infectious agent
- care setting and procedures undertaken.

2 Purpose

This policy is intended to provide guidance on Transmission-Based Precautions and isolation practice.

The policy also applies to individuals employed by agencies and other contractors.

3 Definitions

Term / Abbreviation	Explanation / Definition
Chicken Pox (Varicella Zoster)	Chicken pox (known medically as varicella) is caused by a virus called the varicella-zoster virus.
Cohort Isolation	Cohort nursing refers to the grouping of patients with a given infection or same signs and symptoms within an isolated area
CPE	Carbapenemase-producing Enterobacteriaceae
DH	Department of Health
FFP3	Face Filtering Piece
HAI	Healthcare Associated Infection
IPC	Infection Prevention and Control
Isolation	The use of a single room to prevent transmission of a microorganism from the source patient to others.
MERS	Middle East Respiratory Syndrome (MERS) is a viral respiratory disease caused by a coronavirus (MERS-CoV)
MRSA	Meticillin Resistant *Staphylococcus aureus*
Multi-Resistant MRSA	Resistance to Mupirocin, Tetracycline/Doxycycline, Gentamicin and/or Neomycin
PPE	Personal Protective Equipment
Protective Isolation	Isolation of a patient who is at high risk of infection from organisms carried by others by placement in a single room.
RCA	Root Cause Analysis
RPE	Respiratory Protective Equipment

SARS	Severe Acute Respiratory Syndrome
SCHT	Shropshire Community Health NHS Trust
Standard Infection Prevention and Control Precautions (SICPs)	A set of principles, requiring identification of high risk procedures, minimising exposure to and transmission of microorganisms, including: hand hygiene; managing breaks to the skin; use of PPE; cough etiquette; uniforms; safe disposal of sharps, waste and laundry; management of blood and body fluids.
TB	Tuberculosis
VRE	Vancomycin Resistant enterococci

4 Duties

4.1 Responsibility for Infection Prevention and Control (IPC) outside the immediate scope of this policy

For duties and responsibilities for IPC practices outside the specific scope of this policy, please refer to the IPC Arrangements and Responsibilities Policy on the Staff Zone SCHT Staff Zone (shropcom.nhs.uk).

5 Standard Infection Prevention and Control Precautions (SICPs)

SICPs are to be applied by all staff when caring for any patient. (See Standard Infection Prevention and Control Precautions Policy).

6 Transmission based precautions (TBP)

Transmission based precautions (TBP) do **not** replace SICPs, they are applied in **addition** to SICPs.

One or more TBPs may be required depending on the identified routes of transmission for that infection / condition.

6.1 Type of Transmission based precautions (TBPs):[1]

The types of precautions to be used are:

6.1.1 Contact Precautions

Used to prevent and control infections that spread via direct contact with the patient or indirectly from the patient's immediate care environment (including care equipment). This is the most common route of cross-infection transmission.

6.1.2 Respiratory Precautions[2]

6.1.2.1 Droplet precautions

Measures used to prevent, and control infections spread over short distances (at least 1 metre) via droplets from the respiratory tract of one individual directly onto a mucosal surface or

[1] During the COVID-19 pandemic universal masking in healthcare and increased physical distancing were introduced as additional infection, prevention and control (IPC) measures.
These measures are not included in this policy as the requirement and guidance changes in response to the incidence and severity of the infection in the population. The policy of the Trust will be to implement the national guidance pertaining to COVID-19 or any other pandemic organism, current at the time.
[2] The traditional modes of transmission for respiratory infectious agents as defined before the COVID-19 pandemic are unlikely to be as delineated as is described in the scientific literature, i.e. droplet or airborne transmission and the application of TBPs may differ depending on the setting and the known or suspected infectious agent.

conjunctivae of another individual. Droplets penetrate the respiratory system to above the alveolar level.

6.1.2.2 Airborne precautions

Measures used to prevent, and control infection spread without necessarily having close patient contact via aerosols from the respiratory tract of one individual directly onto a mucosal surface or conjunctivae of another individual. Aerosols can penetrate the respiratory system to the alveolar level.

Appendices 1 and 2 provide details of the type of precautions, optimal patient placement, isolation requirement and respiratory precautions required.

7 Patient placement/assessment of infection risk

The potential for transmission of infection must be assessed promptly when a patient enters a care area. If hospitalised, this should be continuously reviewed throughout the period of care. The assessment will influence patient placement decisions in line with clinical/care need(s) and must be documented. Patients who may present a cross-infection risk includes those:

- with diarrhoea, vomiting, an unexplained rash, fever or respiratory symptoms
- known to have been previously positive with multidrug-resistant organisms (MDRO) e.g. Meticillin-Resistant Staphylococcus Aureus (MRSA), Carbapenemase-Producing Enterobacteriaceae (CPE).
- who have been an inpatient in any hospital in the UK or abroad or are a known epidemiological link to a carrier of CPE.
- who have a known or suspected infection or colonisation with transmissible organisms.

To aid the identification of patients who require single rooms, refer to appendices 1 and 2.

All patient placement decisions and assessment of infection risk (including isolation requirements) must be documented on the patient's notes and provided in patient handovers with other healthcare and care providers.

When considering placement decisions and prioritising rooms when these are in short supply, the clinical judgement and expertise of the clinical teams and the IPC Team must be sought.

7.1 Prioritisation of single rooms

The need for isolation of specific infections does not take into account the limited number of single rooms available. Therefore, when the demand for single rooms exceeds the available number of rooms, a risk assessment must be undertaken. A discussion **must** take place between the clinical team and IPC Team. This Risk Assessment **must** be clearly documented in the patient's medical records.

When unable to isolate a patient immediately, this should be documented and a Datix recorded.

The risk assessment will consider the following factors:

- The pathogen and the ability to protect against or treat individual infections
- The probable route of transmission and evidence of transmission
- Susceptibility of the other patients near to the infected patient in the same bay i.e. do the other patients have open wounds or an invasive device
- Whether the organism is antibiotic resistant.
- Possible detrimental effects of isolation to the patient, including risk of falls, confusion or depression weighed against severity of the risk of transmission to other patients.

Patients with the following conditions must be prioritised for a single room

- Diarrhoea and / or vomiting due to a confirmed or suspected infection
- *Clostridoides difficile*
- Chicken pox
- Pulmonary tuberculosis
- Bacterial meningitis
- MRSA identified in a patient with a desquamating skin condition
- Influenza, or covid or infection (suspected or confirmed).

Appendix 2 Contains a risk scoring tool which gives an indication for prioritising side rooms and applying TBPs.

7.2 Single room isolation

Isolation of infectious patients may be in single room isolation, or cohorting of infectious patients where appropriate, ensuring that they are separated by at least 3 feet (1 metre) with the door closed.

- Signage should be used on doors/areas to communicate isolation requirements and prevent entry of unnecessary visitors, non-essential staff.
- Patient confidentiality must be maintained.
- Infectious patients should only be transferred to other departments if clinically necessary. If the patient has an infectious agent transmitted by the airborne/droplet route, then if possible/tolerated the patient should wear a surgical face mask in communal areas during transfer.
- Receiving department/hospital and transporting staff must be aware of the necessary precautions.
- Isolation room doors should remain closed, if this is not possible, e.g. risk of falls, there should be a documented risk assessment. However the doors must be kept closed during procedures which may throw up dust and microorganisms into the air (e.g. bedmaking).

7.3 Patient Information

The patient must be informed of the reasons for isolation and the procedures to be implemented.

Visitors must have the procedures outlined to them.

7.4 Cleaning

Patient isolation rooms / cohort area must be decontaminated **at least daily**, this may be increased on the advice of the IPC Team. These areas must be decontaminated in line with the Trust's Cleaning and Disinfection Policy (Cleaning and Disinfection Policy} and national cleaning standards.

Manufacturers' guidance and recommended product 'contact time' must be followed for all cleaning/disinfection solutions.

Increased frequency of decontamination/cleaning schedules should be incorporated into the environmental decontamination schedules for areas where there may be higher environmental contamination rates, e.g.:

- toilets/commodes particularly if patients have diarrhoea; and
- "Frequently touched" surfaces e.g. door/toilet handles, locker tops, over bed tables and bed rails.

The IPC Team will advise on the frequency.

7.5 Linen

Treat as infected in line with the Linen and laundry policy. All used linen must be removed from the room after use.

7.6 Waste

Treat all waste as clinical waste in line with the Trust's Waste Policy.

7.7 Cohort Bay

- A cohort refers to a group of patients being placed together in a bay with the same organism (or displaying similar signs and symptoms of infection) should single room capacity be exceeded.
- The distance maintained between each patient must be no less than 1m.
- Cohort patients should only be cared for by designated staff.

As with side rooms, cohort bays require:

- Dedicated hand hygiene facilities.
- Dedicated toileting facilities
- Signage at the entrance to the bay identifying the isolation precautions.
- Disposable gloves and aprons within the bay.
- Dedicated monitoring equipment
- A clinical waste bin must be situated within the bay.
- The cleaning agents and frequency of cleaning a bay should be as for a single room.

7.8 Patient Transport

- Limit the movement and transportation of the patient from the room for essential purposes only.
- The presence of a transmissible condition should not delay urgent clinical investigations. Therefore, if movement or transport of the patient is necessary, minimise patient dispersal of droplet nuclei by placing a surgical mask on the patient if the patient requires respiratory precautions.
- The receiving area must be informed prior to transfer to ensure all appropriate precautions and facilities are in place.
- Patients with known/suspected infections should be seen at the end of the list (as long as this does not detract from their management or care) and not left in waiting areas. This also allows adequate cleaning of the environment and equipment therefore reducing the risk to other patients.

7.9 Equipment

Equipment and furniture in the patient's vicinity should be reduced to an absolute minimum. Dedicated or single use equipment must be available. If reusable equipment is used it must be decontaminated in line with the national cleaning standards using the Trust specified decontamination agent.

7.10 Visitors

Visitors should be aware of the isolation precautions but are not required to wear gloves and aprons unless they are assisting with patient care or are visiting other patients in the hospital. However, they should be advised to decontaminate hands with alcohol gel when leaving.

Visitors must sit on the chairs provided for visitors and not on beds.

PPE is to be worn in accordance with the figure in Appendix 1. This details the PPE to be worn for each of the transmission based precautions.

8 Respiratory Precautions

Respiratory Precautions consist of droplet or airborne precautions. See appendix 1 to identify the PPE required for each category. Note that when aerosol generating procedures are carried out on a patient with a respiratory infection such as influenza or covid, airborne precautions may be required.

For patients with respiratory diseases which are classified as of high consequence, the policy of the Trust is to follow national guidance.

This is available here: High consequence infectious diseases (HCID) - GOV.UK (www.gov.uk) . Examples include MERS, SARS and emerging diseases.

8.1 Ventilation

Adequate ventilation is a vital control measure. To help mitigate inadequate ventilation in Trust premises, systems such as air purifiers (or scrubbers) will be considered. The IPC Team and Trust Estates Lead will advise on the use of such technology.

8.2 Airborne Precautions

8.2.1 Patient Placement

- Must be placed in a single room
- The door must be kept closed and the patient must remain inside the room.

8.2.2 PPE

For PPE see Appendix 1. The Respiratory protective equipment (RPE) should be available and donned outside the room. Gloves and an apron should be available within the room.

8.3 Droplet Precautions

8.3.1 Patient Placement

- In a side room, if there are no side rooms available nurse patient in a cohort bay with other patients who have the same condition.
- The use of technology such as air purifiers should be considered to enhance ventilation.

8.3.2 PPE

For PPE see Appendix 1. The Respiratory Protective Equipment (RPE) should be available and donned outside the room. Gloves and an apron should be available within the room.

- RPE i.e. an FFP3 mask must be worn when carrying out aerosol generating procedures (AGPs) on patients with a known/suspected infectious agent spread wholly or partly by the airborne or droplet route.
- The IPC Team can advise on a case-by-case basis if enhanced respiratory protection is required.

8.4 Contact Transmission Precautions

8.4.1 Patient Placement

- In a side room, if there are no side rooms available nurse patient in a cohort bay with other patients who have the same condition.
- The use of technology such as air purifiers should be considered to enhance ventilation.

8.4.2 Personal protective equipment

For PPE see Appendix 1. RPE should be available and donned outside the room. Gloves and an apron should be available within the room.

8.5 Enteric Contact transmission Precautions

Details as for contact transmission precautions except:

- hands must be cleaned with soap and water.
- Equipment and the environment must be cleaned with a sporicidal disinfectant as per current Trust policy

9 Consultation

This policy has been developed by the IPC Team in consultation with appropriate Locality Clinical Managers and IPC Operational Group Meeting members.

A total of three weeks consultation period was allowed, and comments incorporated as appropriate.

9.1 Approval Process

The IPC Operational Group Meeting members will review this policy and it will then be tabled at the IPC Committee for approval.

10 Dissemination and Implementation

This policy will be disseminated by the following methods:

- Managers informed via Datix who then confirm they have disseminated to staff as appropriate
- Staff – via Communications and IPC newsletters
- Awareness raising by the IPC Team
- Published to the Staff Zone of the Trust website

The web version of this policy is the only version that is maintained. Any printed copies should therefore be viewed as 'uncontrolled' and as such, may not necessarily contain the latest updates and amendments. When superseded by another version, it will be archived for evidence in the electronic document library.

10.1 Advice

Individual Services' IPC Link staff act as a resource, role model and are a link between the IPC Team and their own clinical area and should be contacted in the first instance if appropriate.

Further advice is readily available from the IPC Team or the Consultant Microbiologist.

10.2 Training

Managers and service leads must ensure that all staff are familiar with this policy through IPC induction and update undertaken in their area of practice.

Mandatory IPC training includes Standard Infection Control Precautions. IPC Policies can be found on Staff Zone (Document Library on SCHT Staff Zone (shropcom.nhs.uk)) . Staff may require additional role specific essential IPC training, as identified between staff, their managers and / or the IPC team as appropriate.

11 Monitoring Compliance

Compliance with this policy will be monitored as follows:

- Using the isolation audit tool which encompasses the Trust isolation audit aide memoir.

- Hand hygiene will be audited in accordance with the Hand Hygiene Policy and via Hand Washing Assessments. These audits will be reported through the IPC Committee.
- Audited locally using the Quality ward audits undertaken by the IPC Team and by staff as Self-audits as part of the IPC audit programme.
- Additional periodic auditing and self-audits by clinical teams.
- The IPC Operational Group Meeting will monitor compliance of the cleanliness audit scores and the IPC Team audit programme.

Numbers of staff undertaking IPC training, which includes Standard Infection Control Precautions, will be by the Locality Clinical Managers.

As appropriate the IPC Team will support Services' Leads to undertake IPC CCRs/RCAs and PIRs. Managers and Services' Leads will monitor subsequent service improvement plans and report to the IPC Operational Group Meeting.

Knowledge gained from CCR/RCA/PIR and IPC audits will be shared with relevant staff groups using a variety of methods such as reports, posters, group sessions and individual feedback.

The IPC Team will monitor IPC related incidents reported on the Trust incident reporting system and, liaising with the Head of Risk and Governance, advise on appropriate remedial actions to be taken.

12 References

13 Associated Documents

This policy should be read in conjunction with the Standard Infection Prevention and Control Precautions Policy and the Respiratory Pathway Policy:

14 Appendices

Appendix 1 – Personal protective equipment (PPE) when applying transmission based precautions (TBPs)

SICPs may be insufficient to prevent cross transmission of specific infectious agents and additional precautions (TBPs) may be required. PPE must protect adequately against the risks associated with the procedure or task.

Hand hygiene must be performed before putting on and after removal of PPE.

TBPs	Gloves	Apron	Gown	Fluid resistant surgical mask (FRSM)	Respiratory Protective Equipment (RPE)	Eye/face protection
Contact precautions	✗ Unless exposure to blood or body fluid, mucous membranes, or non-intact skin is anticipated or footnote 1 applies[1]	✓	✗ Unless in place of an apron if extensive spraying or splashing is anticipated	✗ Unless risk of splashing or spraying of blood or body fluids is anticipated or footnote 2 applies[2]	✗	✗ Unless risk of splashing or spraying of blood or body fluids is anticipated
Droplet precautions	✗	✓	✗ Unless risk of splashing or spraying of blood or body fluids is anticipated	✓	✗	✓
Airborne Precautions	✗	✗	✓	✗	✓	✓

Where to put on and remove PPE

Gloves are not an alternative to hand hygiene. Gloves must always be removed after each task on the same patient and hand hygiene performed as per the 5 moments for hand hygiene.

Contact precautions: required PPE should be put on within the patient room/care area immediately **before** direct contact with the patient or their environment and should be removed and disposed of **before** leaving the patient room/care area.

Droplet and airborne precautions: required PPE should be put on **before** entering the patient room/care area. Unless there is a dedicated isolation room with anteroom, gowns, aprons and gloves should be removed and disposed of before leaving the patient room/care area. Eye/face protection and RPE (if worn) must be removed and disposed of **after** leaving the patient room/care area.

1.Clinical risk assessment may also indicate the use of gloves for specific organisms such as scabies, multi-drug resistant organisms or those with increased potential for hand and environmental contamination such as spore forming organisms e.g. *C. difficile*. This list is not exhaustive.
2.Universal masking using FRSM may be indicated as a source control measure during outbreaks of respiratory infectious agents.

PPE requirements for high consequence infectious diseases should be discussed with specialist teams

Appendix 2 – Isolation Risk Assessment Tool

Isolation Risk Assessment Tool

- The patient with the highest score takes precedence. Read down each column, Site score + Organism score + Risk area score = Isolation score
- Neutropenic patients may have to take priority over infectious patients
- Isolation score of 15 or above have absolute priority and must be isolated (record score in nursing notes)

SITE	
Sputum/Respiratory Mucosa Vomiting (Norovirus)	7
Diarrhoeal/Faecal Incontinence Urine	6
Wound High exudate Multi pressure/leg ulcer Skin eczema/psoriasis	5
Bleeding Urine (catheterised) Tracheostomy	4
Pin Sites Peg Sites Blood Culture/Central line tip Supra pubic Cath/Nephrostomy Diarrhoea (Continent) Penis Wound uncovered no exudate Eye	3
Drain Site Wound (Covered) Leg Ulcer (Covered) PD Catheter Peripheral Cannulae	2
Nasal Urine (Continent)	1

ORGANISM/CONDITION	
CPE e.g. NDM Klebsiella TB (Pulmonary) Chickenpox paeds/neonatal & maternity VHF (Viral Haemorrhagic Fever) MRSA (Multi Resistant) MRSA (Mupirocin Resistant) C.diff. Avian influenza	15
Meningococcal meningitis/Septicaemia Carbapenemase-producing P.aeruginosa ESBL Enterobacteriaceae/AmpC Enterobacteriaceae MRSA (Mupirocin Sensitive) GRE/VRE Influenza	10
Chickenpox Other Areas	8
Group A Strep Norovirus Rotavirus Shigella	6
Salmonella Campylobacter Diarrhoea no clinical cause Shingles Scabies	5
Blood Borne Virus i.e Hep B, Hep C, HIV	4

RISK	
VERY HIGH RISK AREAS Intensive Care Unit/HDU Orthopaedics/Trauma Neonatal Unit	7
HIGH RISK AREAS Nephrology Oncology/Haematology Vascular Surgery ICA	6
MEDIUM RISK AREAS Head & Neck General Surgery/urology Gastroenterology Endocrinology Obs and Gynae/Paediatric Medical admissions Cardiology	4
LOW RISK AREAS General medical Rehabilitation/Stroke Accident and Emergency	2
REASSESSMENT MRSA Three clear swabs Wound healed Diarrhoea stopped 48 hours Bleeding stopped (for BBV) On effective treatment (TB x 14/7) Meningitis on treatment	0

Appendix 3 – Aide memoire for optimal patient placement and respiratory protective equipment (RPE) for infectious agents in hospital inpatients (based on evidence from WHO, CDC and UKHSA)

The clinical judgement and expertise of the IPC and Health Protection teams should be sought for novel, unusual pathogens or where an increase in cases has been detected in any care setting. Advice can also be sought from the bacterial reference departments at UKHSA for rare / unusual pathogens, exceptional phenotypes or for advice regarding typing of outbreak strains.

The following table outlines the transmission-based precautions (TBPs) required for several infectious agents / diseases which will minimise cross transmission events from and between patients, and healthcare workers. The details included in the table below are drawn from published evidence from a number of validated sources, for example, WHO, CDC, and UKHSA. The table is intended to function as a quick reference guide, is not exhaustive, and is not intended to replace appropriate risk assessment and clinical judgement or formal assessments by public health agencies. The table summarises:

- Optimal patient placement while the patient is considered infectious; and
- The recommended RPE (recognising other PPE is required) to minimise risk of cross infection to staff, patients and visitors.
- Decisions made by staff regarding use/non-use of RPE will depend on the completion of clinical risk assessment, considering presenting symptoms, available treatments, the risk of acquisition, the level of interaction, task to be performed, and / or the anticipated level of exposure to blood and / or other body fluids.
- In the hospital setting patients with suspected or confirmed respiratory symptoms should, whenever possible, be placed in a single room, ideally with en suite facilities If a single / isolation room is not available, cohort patients with confirmed respiratory infection with other patients confirmed to have the same infectious agent. Patients with suspected or confirmed respiratory infection should be provided with a surgical facemask (Type II or Type IIR) to be worn in multi-bedded bays and communal areas if this can be tolerated, and where the patient cannot be isolated in a single room.
- Note: *The distinction between droplet and aerosol transmission is not always clearly defined. A dynamic clinical risk assessment should be performed using the hierarchy of controls to inform the assessment and should include evaluation of the ventilation in the area, operational capacity, and prevalence of infection in the local area. Staff should be provided with training on the correct use of RPE. Current guidance is that an FFP3 respirator must be worn by staff when caring for patients with a suspected or confirmed infection spread by the airborne route, when performing AGPs on a patient with a suspected or confirmed infection spread by the droplet or airborne route, and when deemed necessary after risk assessment.

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
Acute infectious hepatitis of unknown aetiology	Acute hepatitis	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	Yes
Adenovirus[1]	Upper +/- lower respiratory tract infection	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	No
	Conjunctivitis, gastroenteritis	Contact	Single en-suite room	No requirement for RPE	No
Bacillus anthracis	Respiratory, gastrointestinal or cutaneous Anthrax	Contact	Single en-suite room	No requirement for RPE [6]	Yes
Bacillus cereus	Gastroenteritis, sepsis, pneumonia, endocarditis, central nervous system (CNS) and ocular infections	Contact	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	No requirement for RPE	If associated with food poisoning
Bordetella pertussis	Whooping Cough	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs until patient has been established on appropriate antimicrobial treatment[5]	Yes
Candida auris	Ear, wound and bloodstream infection	Contact	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	No requirement for RPE	No

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
Carbapenemase producing Enterobacterales (CPE) (either swab positive or positive as per clinical risk assessment criteria)	Colonisation, device associated infections – urinary tract infection, catheter associated bacteraemia	Contact	Single en-suite room	No requirement for RPE	No
Chlamydia pneumoniae	Pneumonia	Droplet	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	No
Clostridioides difficile	Clostridioides difficile infection (CDI)	Contact	Single en-suite room	No requirement for RPE	No
Coronavirus[1] (Seasonal) including SARS- CoV-2	Respiratory symptoms including asymptomatic presentations COVID-19	Droplet/Airborne * please see note above	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs* please see note above	No Yes SARS-CoV-2
Corynebacterium diphtheria or Corynebacterium ulcerans	Diphtheria – Cutaneous, Pharyngeal (toxigenic strains)	Contact, Droplet (If Pharyngeal)	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs (if pharyngeal)	Yes
Enterovirus D68	Mild to moderate upper respiratory tract infections. Can cause severe respiratory illness and rarely acute flaccid myelitis (AFM)	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	No

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
Gastrointestinal infections e.g. Salmonella spp.	Gastroenteritis	Contact	Single en-suite room	Fluid resistant surgical facemask (FRSM) if vomiting is present.	(Some GI Infections are notifiable. Refer to guidance)
Haemophilus influenzae (all invasive*)	Epiglottitis, *meningitis, pneumonia, *bacteraemia	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs until patient has been established on appropriate antimicrobial treatment[5]	Yes *Only
Hepatitis A virus	Hepatitis, Gastroenteritis	Contact	Single en-suite room	Fluid resistant surgical facemask (FRSM) if vomiting is present.	Yes
Herpes zoster (Shingles) (varicella-zoster) [2]	Shingles (vesicle fluid)	Contact	Single en-suite room If lesions cannot be covered	No requirement for RPE	Notifiable organism but not notifiable disease
	Disseminated zoster	Airborne	Isolation room/suite	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	Notifiable organism but not notifiable disease
Influenza virus (Endemic strains)	Influenza	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	Yes
Measles virus[2]	Measles (rubeola)	Droplet/ Airborne	Isolation room/suite	FFP3 or Hood for routine care and AGPs	Yes

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
Meticillin resistant Staphylococcus aureus (MRSA)	Colonisation, or clinical infection (skin and wound infections, endocarditis, pneumonia, osteomyelitis, urinary tract infections and bacteraemia)	Contact	Single en-suite room	FFP3 or Hood for AGPs only if pneumonia	No
Mumps virus[2]	Mumps (infectious parotitis)	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	Yes
Mycobacterium tuberculosis complex	Extrapulmonary Tuberculosis	Contact	Single en-suite room	FFP3 or Hood for AGPs	Yes
	Pulmonary or laryngeal disease	Airborne	Isolation room/suite until patient has been established on appropriate antimicrobial treatment[5] and always if the patient has MDR or XDR TB	FFP3 or Hood for routine care and AGPs until patient has been established on appropriate antimicrobial treatment[5] and always if the patient has MDR or XDR TB	Yes
Mycoplasma pneumoniae	Pneumonia	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	No
Neisseria meningitides	Meningitis – meningococcal (Or presentation of clinical meningitis of unknown origin), septicaemia	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs until patient has been established on appropriate antimicrobial treatment[5]	Yes

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
Norovirus	Winter vomiting disease	Contact	Single en-suite room	Fluid resistant surgical facemask (FRSM) if vomiting is present.	No (hospital outbreaks are reportable)
Panton Valentine Leukocidin (PVL) – positive Staphylococcus aureus	Skin and soft tissues infection, necrotising pneumonia, necrotising fasciitis, osteomyelitis, septic arthritis and pyomyositis, purpura fulminans	Contact	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs (only if pneumonia)	No
Parainfluenza virus[1]	Upper +/- lower respiratory tract infection	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	No
Parvovirus B19 – (Erythema infectiosum – Erythrovirus B19)	Slapped cheek syndrome	Droplet	Single en-suite room until the rash+/- arthralgia has developed	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs (Not required if the rash+/- arthralgia has developed)	No
Pneumocystis jirovecii	Pneumonia	Droplet	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	No requirement for RPE	No
Pseudomonas aeruginosa	Pneumonia, bacteraemia, wound or surgical site infections, catheter associated urinary tract infections, conjunctivitis in neonates	Droplet	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	No requirement for RPE	No

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
Respiratory syncytial virus (RSV)[1]	Upper +/- lower respiratory tract infection	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	No
Rotavirus	Gastroenteritis	Contact	Single en-suite room	No requirement for RPE	No
Rubella virus[2]	German Measles	Droplet	Single en-suite room	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs	Yes
Serratia marcescens	Pneumonia, bacteraemia, urinary tract infections, wound infections	Contact	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	No requirement for RPE	No
Staphylococcus aureus (Enterotoxigenic)	Gastroenteritis, scalded skin syndrome	Contact	Single en-suite room (not required if lesions can be covered)	No requirement for RPE	No
Stenotrophomonas maltophilia	Bacteraemia, respiratory infections, urinary tract and surgical-site infections	Contact	Single en-suite room in high risk settings e.g. ICU/PICU/NICU, oncology/haematology	No requirement for RPE	No
Streptococcus pneumoniae	Pneumonia	Droplet	Single en-suite room (until patient has been established on appropriate antimicrobial treatment[5])	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs until patient has been established on appropriate antimicrobial treatment[5]	Yes
	Bacteraemia, meningitis, wound	Contact	Single en-suite room (until patient has been established on appropriate antimicrobial	No requirement for RPE	Yes (presence in the wound is not notifiable)

Suspected or confirmed Pathogen	Disease	Transmission based precautions (TBPs) required	Optimal placement while patient is considered infectious and until resolution of symptoms	Respiratory protection (RPE) for healthcare workers while patient is considered infectious[3]	Notifiable under Public Health Act 1984 and Health Protection Regulations 20104
	infection or infection in other normally sterile site		treatment[5])		
Streptococcus pyogenes (Group A Strep)	Respiratory infection	Droplet	Single en-suite room (until patient has been established on appropriate antimicrobial treatment[5])	Fluid resistant surgical facemask (FRSM) for routine care and FFP3 or Hood for AGPs until patient established on appropriate antimicrobial treatment[5]	No
	Invasive Group A strep Bacteraemia, meningitis, wound infection/infection in other normally sterile site	Contact	Single en-suite room (until patient has been established on appropriate antimicrobial treatment[5])	No requirement for RPE	Yes
Varicella virus[2] See Herpes Zoster	Chickenpox	Airborne	Isolation room/suite	FFP3 or Hood for routine care and AGPs	Yes
Shiga-toxin producing Escherichia coli (STEC) Verocytotoxigenic Escherichia coli (including E.coli O157) Haemolytic uraemic syndrome (HUS)	Gastroenteritis, haemolytic uremic syndrome, thrombotic thrombocytopaenic purpura.	Contact	Single en-suite room	No requirement for RPE	Some conditions notifiable (refer to guidance)

Footnote 1

In routine clinical practice healthcare workers do not commonly wear masks when dealing with patients presenting with the “common cold” or “influenza – like illness”. However, in a patient with undiagnosed respiratory illness where coughing and sneezing are significant features, or in the context of known widespread respiratory virus activity in the community or a suspected or confirmed outbreak of a respiratory illness in a closed or semi-closed setting, the need for appropriate respiratory and facial protection to be worn should be considered.

Footnote 2

In relation to childhood illnesses and use of RPE, no vaccine offers 100% protection and a small proportion of individuals acquire/become infected despite vaccination or known IgG immunity (previous infection). Vaccination is still the best protection against many infectious diseases. If staff are uncertain of their immunisation status, they should discuss this with their occupational health provider. It is recommended that vaccinated individuals wear RPE as detailed in this appendix to minimise any residual risk, and to promote consistency in practice across all staff groups.

Footnote 3

The ocular route of transmission for pathogens spread by the droplet/airborne route while plausible lacks scientific evidence. This lack of evidence includes having very little certainty about what the incremental benefit of using eye protection routinely when using a FRSM/FFP3 respirator. Eye protection is considered to be necessary and worn if there is a risk of spraying or splashing of blood/body fluids from patient contact or procedure, and always when used with respirators during the performance of AGPs. This is line with published infection control guidance.

Footnote 4

Registered medical practitioners (RMPs) have a statutory duty to notify the 'proper officer' at their local council or local health protection team (HPT) of suspected cases of certain infectious diseases.

Complete a notification form immediately on diagnosis of a suspected notifiable disease. Don't wait for laboratory confirmation of a suspected infection or contamination before notification. Consult the UKHSA Notifiable Diseases poster (PDF, 1020KB, 1 page) for further information.

Send the form to the proper officer within 3 days, or notify them verbally within 24 hours if the case is urgent by phone, letter, encrypted email or secure fax machine.

If you need help, contact your local HPT using the postcode lookup. For more detail on reporting responsibilities of RMPs, see page 14 of Health Protection Legislation (England) Guidance 2010.

All proper officers must pass the entire notification to UKHSA within 3 days of a case being notified, or within 24 hours for urgent cases.

Footnote 5

Appropriate antimicrobial treatment will include the choice of treatment, dose, frequency and number of days of treatment. It will vary by organism and should be determined by the clinical team and informed by local and national prescribing guidance where available.

Footnote 6

Anthrax: during the bacteraemic phase split blood products should be removed immediately using sodium dichloroisocyanurate granules to prevent subsequent sporulation on contact with air / soil.

Appendix 4 – Aide memoire for optimal patient placement and respiratory protective equipment (RPE) for high consequence infectious diseases

High Consequence Infectious Diseases (HCID)

- Should be discussed immediately with specialist teams including health protection teams and the imported fever service, UKHSA which provides 24-hour, 7 days a week telephone access to expert clinical and microbiological advice. Hospital doctors across the UK can contact the IFS after discussion with the local microbiology, virology or infectious disease consultant.
- Once an HCID has been confirmed cases in England should be transferred rapidly to a designated HCID Treatment Centre.

HCID is defined according to the following criteria:

- acute infectious disease
- typically has a high case-fatality rate
- may not have effective prophylaxis or treatment
- often difficult to recognise and detect rapidly
- ability to spread in the community and within healthcare settings
- requires an enhanced individual, population and system response to ensure it is managed effectively, efficiently and safely HCIDs are further divided into contact and airborne groups. Contact HCIDS are usually spread by direct contact with an infected patient or infected fluids, tissues and other materials, or by indirect contact with contaminated material and fomites. Airborne HCIDS are spread by respiratory droplets or aerosol transmission, in addition to contact routes of transmission. Specific Infection Prevention and Control (IPC) measures are required for suspected and confirmed HCID cases, in all healthcare settings.

HCID	Pathogen	Predominant mechanism of spread	Optimal Placement while suspected cases	Required PPE	Notifiable under Public Health Act 1984 and Health Protection Regulations 2010.
Contact HCID	Argentine haemorrhagic fever (Junin virus) Bolivian haemorrhagic fever (Machupo virus) Crimean Congo haemorrhagic fever (CCHF) Ebola virus disease (EVD) Lassa Fever Lujo virus disease Marburg virus disease (MVD) Severe fever with thrombocytopaenia syndrome (SFTS)	Contact	Complete risk assessment to define Possibility of HCID in suspected cases Single side room with ensuite facilities / dedicated commode.	Low possibility: Gloves, plastic apron (Eye protection and fluid repellent surgical facemask for splash inducing procedures) High Possibility: Double Gloves Fluid repellent disposable gown, full length plastic apron over coverall / gown, Fluid repellent FFP3 respirator Fluid repellent footwear Eye protection Head cover	Yes
Airborne HCID	Andes virus infection (hantavirus) Avian influenza A H7N9 and H5N1 Avian influenza A H5N6 and H7N7 Middle East respiratory syndrome (MERS) Monkeypox[1] Niapah virus infection Pneumonic plague (Yersinia pestis) Severe acute respiratory syndrome (SARS).	Unknown; assume airborne until further information available	Single side room with ensuite, ideally under negative pressure	As a minimum FFP3 respirator, gown, gloves and eye protection Additional contact measures may be required according to pathogen: See above for high possibility contact HCID	Yes

1. At May 2022, refer to UKHSA principles for control of monkeypox in England (May 2022). The specific clade associated with the current outbreak of monkeypox since May 2022 was declassified as an HCID in July 2022 following review by the Advisory Committee on Dangerous Pathogens (ACDP) and agreement by the UK 4 nations public health agencies. Future importations of monkeypox directly from West Africa as well as cases caused by the Congo basin clade of the virus will still be classified as HCIDs, as their clinical outcomes may not necessarily be benign.

Further resources:

High consequence infectious diseases (HCID) - GOV.UK (www.gov.uk)

Viral haemorrhagic fever: ACDP algorithm and guidance on management of patients - GOV.UK (www.gov.uk)

VHF_Algo.pdf (publishing.service.gov.uk)