Bwrdd Iechyd Prifysgol
Hywel Dda
University Health Board

TRANSMISSION BASED PRECAUTIONS – POLICY ON CONTACT/AIRBORNE/DROPLET PRECAUTIONS

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		Tracey Nicholas		Infection Prevention Control Group	April 2017	31.10.2017
		Tracey Nicholas	Extended whilst full review finalised	Infection Prevention Control Group	17.10.17	31.03.2018

Brief Summary of Document:	This Policy describes when patients require isolation from contact, airborne and droplet infections and the standard infection control precautions required to treat them.

To be read in conjunction with:	149 - Hand Hygiene Policy, 151 - Personal Protective Equipment Policy 154 - Management of Linen Policy 187 - Exposure Management including Sharps Injuries 236 – Outbreak Management Policy 258 – Waste Management Policy 354 - Policy Standard Infection Control Precautions (SICPs), , 230 – Policy for the Management of Blood and Body Fluids, 152 – Policy for the Management of Viral Haemorrhagic Fever (VHF). 232 – Control of the Environment/Environmental cleanliness Policy and Procedure.

Classification:	Clinical	Category:	Policy	Freedom Of Information Status	Open

Authorised by:	Caroline Oakley	Job Title	Director of Nursing	Signature:	A signed copy of this document is stored with Corporate Services

HYWEL DDA UNIVERSITY HEALTH BOARD

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Scope	**ORGANISATION WIDE**	✓	**DIRECTORATE**		**DEPARTMENT ONLY**		**COUNTY ONLY**	

Staff Group								
	Administrative/ Estates		Allied Health Professionals	✓	Ancillary		Maintenance	
	Medical & Dental	✓	Nursing	✓	Scientific & Professional	✓	Other	

CONSULTATION	**Please indicate the name of the individual(s)/group(s) or committee(s) involved in the consultation process and state date agreement obtained.**			
	Individual(s)	Infection Prevention & Control Nurses	**Date(s)**	May 2013
	Group(s)	County Heads of Nursing, Medical Director, Assistant Director of Nursing Practice	**Date(s)**	June 2013
	Committee(s)	Infection Prevention & Control Committee	**Date(s)**	December 2013

RATIFYING AUTHORITY (in accordance with the Schedule of Delegation)	**KEY**		**COMMENTS/ POINTS TO NOTE**
NAME OF COMMITTEE	A = Approval Required FR = Final Ratification	**Date Approval Obtained**	
Clinical Policy Review Group	FR	25.02.2014	

Date Equality Impact Assessment Undertaken	19th June 2013	**Group completing Equality impact assessment**	Jackie Hooper Tracey Nicholas

Please enter any keywords to be used in the policy search system to enable staff to locate this policy	Airborne, contact, droplet, infectious diseases, gloves, aprons, hand hygiene, linen, waste, isolation

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Document Implementation Plan			
How Will This Policy Be Implemented?	Utilising normal policy dissemination routes		
Who Should Use The Document?	All health care workers		
What (if any) Training/Financial Implications are Associated with this document?	N/A		
What are the Action Plan/Timescales for implementing this policy?	**Action**	**By Whom**	**By When**
	Publish approved policy onto intranet	Policy Coordinator	April 2014
	Advertise published policy via global email	Policy Coordinator	April 2014
	Awareness workshops across the Health Board	Infection Prevention and Control Team	April 2014
	Promotion via the Infection Prevention and Control Link Nurse System	Infection Prevention and Control Team/Link Nurses	April 2014

CONTENTS

1. EXECUTIVE SUMMARY/KEY POINTS

Transmission Based Precautions (TBPs) are categorised according to the route of transmission of the infectious agent such as contact, airborne and droplet.

TBP's are necessary because transmission of specific agents will not be prevented by Standard Infection Control Precautions (SICPs) alone

TBPs are required in all healthcare settings when a patient is known or suspected to be infected/colonised with an infectious agent or an epidemiologically important organism that can spread by the contact, airborne and droplet route.

The duration of TBPs for specific infectious agents spread by contact, airborne or droplet is listed in Appendix 1 (however, this list is not exhaustive)

Contact precautions are a set of infection control measures which are designed specifically to prevent and control the transmission of infectious agents spread by direct or indirect contact to patients and health care workers during provision of care.

Airborne precautions are a set of infection control measures which are designed specifically to prevent and control the transmission of infectious agents spread by small particles in the respirable size range to patients and healthcare workers during provision of care.

Airborne precautions are used to prevent and control infections spread without necessarily having close patient contact via aerosols (<5μm) from the respiratory tract of one individual directly onto a mucosal surface or conjunctivae of another individual. Aerosols penetrate the respiratory system to the alveolar level.

Droplet precautions are a set of infection control measures which are designed specifically to prevent and control the transmission of infectious agents spread by small droplets to patients and healthcare workers during provision of care.

Droplet transmission is defined as the transfer of a large droplet (>5um) from the respiratory tract of an infected individual directly onto a mucosal surface of conjunctivae of another individual. Due to the comparative large size of the particles it is accepted that droplets when dispelled only travel short distances through the air, e.g. less than 3 feet (1 metre away). The activity, which resulted in the droplet expulsion from the respiratory tract, affects this distance of spread and therefore has to be considered when precautions are being taken.

2. INTRODUCTION

TBPs, in addition to Standard Infection Control Precautions (SICPs), are a set of measures that must be implemented when patients are either suspected or known to be infected with a specific infectious agent, when aiming to prevent and control spread. The purpose of this policy is to ensure that the correct procedures are followed for patients who have a contact, droplet, or airborne infection.

3. POLICY STATEMENT

The commitment of the Health Board is to promote a culture of zero tolerance to any health care associated infection (HCAI), with the ultimate aim of preventing all avoidable infections through use of TBPs.

4. SCOPE

This Policy should be used by all health care workers.

5. AIM

It is the intent that this Policy will provide a common, consistent approach to infection prevention and control, and wherever possible prevent transmission of infection within the healthcare setting.

6. OBJECTIVES

For all health care workers to adhere to contact, airborne and droplet transmission based precautions to aid prevention of transmission of infection.

7. WHAT ARE TRANSMISSION BASED PRECAUTIONS?

TBPs are categorised according to the route of transmission of the infectious agent such as contact, airborne and droplet.

7.1. Why are transmission based precautions necessary?

TBPs are necessary because transmission of specific agents will not be prevented by SICPs alone e.g. *Mycobacterium tuberculosis.* SICPs are the minimum set of measures to be applied at all times within a healthcare setting. SICPs should be applied for both recognised and unrecognised sources of infection and are intended to protect the patient, healthcare worker and any visitors/carers.

SICPs must underpin all healthcare activities and should be applied at all times when exposure to blood, other body fluids secretions or excretions (except sweat) non intact skin or mucous membranes may occur. SICPs also apply to equipment or items in the patient's environment that may have become contaminated.

7.2. When should Transmission Based Precautions be applied?

TBPs are required in all healthcare settings when a patient is known or suspected to be infected/colonised with an infectious agent or an epidemiologically important organism that can spread by the contact, airborne and droplet route.
This includes precautions to be taken with those;

- With active infections
- Who are incubating infectious disease
- Who are asymptomatic but suspected to be infectious
- Who are colonised with pathogenic micro-organisms

7.3. How long should Transmission Based Precautions remain in Place?

The duration of TBPs for specific infectious agents spread by contact, airborne or droplet is listed in Appendix 1 (however, this list is not exhaustive). TBPs may need to be lengthened, e.g. for a patient who is immunocompromised due to risk of prolonged shedding of organisms. This decision should be based on the patient's situation, symptoms, and treatment and be guided by the physician and the IPCT.

8. CONTACT PRECAUTIONS PROCEDURE

8.1. What are contact precautions?

Contact precautions are a set of infection prevention and control measures which are designed specifically to prevent and control the transmission of infectious agents spread by direct or indirect contact to patients and healthcare workers during provision of care. These precautions include;

- Isolation
- Hand hygiene
- Use of personal protective equipment (PPE)
- Care of equipment and environment including decontamination
- Safe handling of linen
- Safe handling of waste

8.1.1. Why are contact precautions important within the health and social care settings?

It is important to prevent infectious agents that could be present on, for example, a patient's skin/mucous membranes, or immediate environment, from being transmitted via contact to others and resulting in HCAIs. This is the most common mode of transmission of infectious agents in healthcare settings and therefore it is essential that all healthcare workers understand how to prevent spread via this route

8.1.2. What is the rationale for contact precautions?

Contact precautions are required to prevent the transmission of infectious agents via direct and indirect contact and to minimise HCAIs. Due to the nature of contact transmission the precautions described are pivotal and must be applied during any health and social care activity, even those not formally associated with additional infection control precautions. This includes activities such as feeding, playing, or close contact care when a patient has an infectious agent.

- Direct contact transmission is when an infectious agent is transferred directly from one person to another e.g. skin to skin contact when scabies is present or transfer of an infectious agent from an open wound of an infected individual to the mucous membranes or skin break in another susceptible individual.
- Indirect contact transmission is when an infectious agent is transferred to an individual from an object and/or other person. This can occur in a number of ways and varies depending on the infectious agent. An example of a mode on indirect transmission includes via the hands of healthcare workers after contact with an infected or colonized patient's environment, patient care equipment, or surgical instruments which have been inadequately decontaminated. In addition, transmission can occur through direct contact via toys.

8.1.3. When are contact precautions required?

The need for contact precautions will vary depending on the patient, the setting and the infectious agent (please refer to Appendix 1) and the procedures/activities being undertaken. For example, highly dependent in-patient areas may require different considerations to a mental health setting.

Contact precautions are required in all health care settings when a patient is known or suspected to be infected/colonized with certain infectious agents or epidemiologically important organism that can be spread by contact. These precautions are to be taken when patients have active infections, those who are incubating an infectious disease and those who are asymptomatic but suspected to be infectious and those who are colonized with pathogenic micro-organisms.

8.2. Standard Infection prevention and control CONTACT precautions

8.2.1. Patient placement/isolation

Patient placement or isolation requires a risk assessment in order to determine the most appropriate placement for the patient. This will depend on;

- The infectious agent
- The patient and their overall condition e.g. a productive cough
- The area the patient is being cared for.This includes the potential for adverse outcomes in others and the availability of single rooms.
- The procedure/activities being undertaken

Where appropriate, single rooms with ensuite toilet and hand washing facilities are preferred for patients with known/suspected infections requiring contact precautions. The requirement to keep the door shut shall be on a risk assessment basis but is considered good practice.

If placement in a single room with toilet and hand washing facilities or transfer is not possible, placement decisions should be subject to a risk assessment and discussion with the IPCT. Placement might include;

- In a single room with no ensuite facilities
- Cohorting – where cohorting is the only option this should be based on placing those with the same known/suspected infection in a designated area. If cohorting is not possible, do not place with immunocompromised patients
- The decision to either cohort or use rooms/cubicles without facilities will depend on a number of factors. Advice should be sought from the IPCT.

8.2.2. Hand Hygiene

Hand hygiene is essential in preventing HCAIs particularly for contact precautions. Please refer to the Health Board 149 - Hand Hygiene Policy.

8.2.3. Respiratory Hygiene and Cough Etiquette

Reinforce good respiratory hygiene with the patient at all times and assist as necessary

- Ensure patients cover the mouth and nose wit a disposable tissue.
- Wearing gloves, place tissue into a waste bin.
- Remove gloves and wash hands.

8.2.4. Personal Protective Equipment PPE

PPE is essential in preventing HCAIs particularly for contact precautions. Please refer to the Health Board 151 - Personal Protective Equipment Policy.

Gloves and aprons;

- Disposable gloves and plastic aprons should be put on and worn during care activities and where there will be contact with the patient or their immediate environment.
- The use of a disposable fluid repellent gown maybe more appropriate in order to gain more protection including the arms for specific infections. Advice should be sought from the IPCT.

Face Protection;

- Face/eye protection including masks and goggles are required if there is a risk of mucosal splashing to the eyes and mouth.

Good practice points;

- Supplies of PPE must be available at the entrance to single or cohort rooms.

- Aprons and gloves must be put on before undertaking care activities.
- No outer coats to be worn.
- PPE must be removed immediately upon leaving the room followed by hand washing.
- PPE must be changed between different procedures and care activities including gloves.
- PPE must be changed and hand hygiene performed between contact with every patient/client/resident, including others being cared for under contact precautions within the same area.
- Safe disposal of PPE is essential immediately following removal.

8.2.5. Management of Care Equipment

Care equipment must be given additional consideration in order to prevent the spread of infectious agents that might be contaminating items.

- Equipment must be allocated to individuals being cared for under contact precautions e.g. commodes.
- Equipment must not be shared with others unless thoroughly decontaminated first.
- Items of equipment must be intact. Items that are not intact must be removed and replaced with intact items.
- Where possible use single use only disposable products.

8.2.6. Control of the Environment

Care of the environment must be given additional consideration in order to prevent the spread of infectious agents that might be contaminating items. Please refer to the Health Board 232 – Control of the Environment/Environmental cleanliness Policy and Procedure.

- The environment must be cleaned at least daily and when visibly contaminated. Particular attention must be given to frequently touched items e.g. door handles, bed tables etc.
- An increase in frequency must be considered particularly during outbreaks of infection e.g. diarrhoea and/or vomiting
- The environment must be clutter free to allow for effective cleaning
- Equipment for cleaning must follow the Health Board's colour coded cleaning system. These items must be clean, fit for purpose and decontaminated and/or disposed of appropriately
- Terminal cleaning of the environment MUST be performed prior to use by any other patient.

8.2.7. Safe Management of Linen

Linen that could be contaminated must be managed safely in order to avoid cross transmission of infectious agents. They should be bagged following the Health Board 154 - Safe Management of Linen Policy as follows;

- Place contaminate linen into an alginate bag at the point of removal. DO NOT carry linen out of the room.
- Place alginate bag in appropriate colour coded bag.
- Remove gloves and wash hands.
- Communicate with others who may handle linen to ensure they take appropriate precautions.

8.2.8. Management of blood and body fluid spillage

All body fluid spillages must be cleaned and decontaminated following the Health Board 230 - Management of Body Fluid Policy.

8.2.9. Safe Management of Waste

All waste must be segregated and disposed of in accordance with 258 – Waste Management Policy.

- Waste that could be contaminated must be managed safely in order to avoid cross infection of infectious agents.
- All waste generated from an infected or suspected of being infected patient must be disposed of into orange clinical waste bags (acute setting) or appropriate colour waste bags for contaminated waste.

9. AIRBORNE PRECAUTIONS PROCEDURE

9.1. What are airborne precautions?

Airborne precautions are a set of infection control measures which are designed specifically to prevent and control the transmission of infectious agents spread by small particles in the respirable size range to patients and healthcare workers during provision of care.
These precautions include;

- Patient placement/Isolation
- Respiratory hygiene/cough etiquette
- Hand hygiene
- Use of personal protective equipment (PPE)
- Care of equipment and environment including decontamination
- Management of body fluid spillage
- Cleanliness of the environment
- Safe handling of linen
- Safe handling of waste
- Occupational exposure management (including sharps injuries).

9.1.1. Why are airborne precautions important within the health care settings?

It is important to prevent infectious agents that could be present in, for example, the respiratory tract of individuals, being transmitted via contact to others and resulting in HCAIs.

9.1.2. What is the rationale for airborne precautions?

Airborne precautions are used to prevent and control infections spread without necessarily having close patient contact via aerosols (<5µm) from the respiratory tract of one individual directly onto a mucosal surface or conjunctivae of another individual. Aerosols penetrate the respiratory system to the alveolar level.

It is essential to apply the relevant infection control precautions during any relevant health care activity. Due to the fact that these are small particles that remain infectious over time and distance and are able to enter the respiratory tract of others without necessarily having close contact (or being in the same room), the precautions described are pivotal. Any aerosol generating procedure which results in the expulsion of small particles within the respiratory size range must be considered when precautions are taken.

Aerosol generating procedures include: -

- Intubation
- Nasopharyngeal aspiration
- Tracheostomy care
- Chest physiotherapy
- Bronchoscopy
- Continuous positive airways pressure (PAP)
- Non-invasive ventilation
- Suctioning
- Humidification.

} FFP3 Masks or equivalent to be worn (Health Protection Agency 2012)

Infected individuals can cause respiratory droplets to be expelled as a result of coughing, sneezing and even talking. There can also be a risk during certain healthcare procedures such as endotracheal intubation and suctioning.

9.1.3. When are airborne precautions required?

The need for airborne precautions will vary depending on the patient, the setting and the infectious agent (please refer to Appendix 1) and the procedures/activities being undertaken. For example, highly dependent in-patient areas may require different considerations to a mental health setting.

Airborne precautions are required in all health care settings when a patient is known or suspected to be infected/colonized with certain infectious agents or epidemiologically important organism that can be spread by the airborne route.

These include precautions to be taken with those with active infections, who are incubating an infectious disease, who are asymptomatic but suspected to be infectious and those who are colonized with pathogenic micro-organisms

9.2. **Standard Infection prevention and control AIRBORNE precautions**

9.2.1. Patient placement/isolation

Patient placement or isolation requires a risk assessment in order to determine the most appropriate placement for the patient/cline/resident. This will depend on;

- The infectious agent.
- The patient and their overall condition e.g. a productive cough.
- The area the patient is being cared for. This includes the potential for adverse outcomes in others and the availability of single rooms.
- The procedure/activities being undertaken.

Patients with certain known/suspected infections requiring airborne precautions should be placed in an isolation room or negative pressure isolation room with hand washing, toilet and shower (ensuite) facilities as soon as possible. The door to this room MUST remain closed.

If there are no isolation rooms available then placement decisions should be performed with local risk assessments with support from the IPCT and Consultant Microbiologist and may include;

- Placement in a room with ensuite facilities, Door MUST be closed.
- Placement in a single room with no ensuite facilities. The door MUST remain closed. The room must be ventilated if possible via an open window to allow for the exchange of air. The patient should wear a surgical mask when in close contacts with others.

- Cohorting is not recommended for those infections spread via the airborne route.

9.2.2. Hand Hygiene

Hand hygiene is essential particularly for airborne precautions. Please refer to the Health Board 149 – Hand Hygiene Policy.

9.2.3. Respiratory Hygiene and Cough Etiquette

Reinforce good respiratory hygiene with the patient at all times and assist as necessary;

- Cover nose and mouth with disposable single-use tissues when sneezing, coughing, wiping or blowing noses.
- Dispose of all tissues immediately into a orange clinical waste bin.
- Offer and encourage the patient to wash hands after coughing, sneezing, using tissues, or after contact with respiratory secretions and contaminated objects.
- Keep hands away from the mucous membranes of the eyes and nose. Certain patients (e.g. the elderly and children) may need assistance with containment of respiratory secretion; those who are immobile will need a receptacle (e.g. a small plastic orange clinical waste bag) readily at hand for the immediate disposable of used tissues and should be offered hand hygiene facilities.
- Instruct patient and any visitors or carers on the steps described above.

9.2.4. Personal Protective Equipment (PPE)

PPE is essential in preventing HCAIs particularly for contact precautions. Please refer to the Health Board 151 - Personal Protective Equipment Policy.

Masks and other facial protection:

- Respiratory masks i.e. FFP3 masks (not surgical masks) are designed to prevent inhalation of infectious airborne particles and subsequent access to the mucous membranes of the respiratory tract of an individual. This is one of the key precautions to be considered when delivering care to those infections transmissible by the airborne route.
- The use of these masks applies to those with active respiratory multi-drug resistant (MDR) *Mycobacterium Tuberculosis*. It also applies when extra pulmonary TB and/or infectious TB lesions are present and aerosol-generating procedures are being undertaken (for advice when FFP3 are no longer required please contact IPCT)

The FFP3 masks must be;

- Fit tested – the efficiency of the mask depends on them being a tight fit to the wearer's face. This procedure must be performed by either trained Health & Safety representative or IPCT.
- Fit checked – each time a FFP3 mask has been put on it should be fit checked by the wearer before entering the patient's area.
- Put on before entering the affected area.
- Changed if you feel you cannot breathe with it on or it is damaged or torn by you (you should leave the room immediately and only then removed and dispose of the mask).
- not be routinely worn when caring for those patients with chickenpox, measles or disseminated herpes zoster. This is due to the fact that once the skin lesions are evident and the infectious agent is known to be present, communicability through the airborne route is less significant. This is known to be the case because it is expected that most health care workers have immunity through vaccination/exposure to chickenpox/measles.
- Worn by patients due to the nature of the mask which filters inhaled and not exhaled air.

Surgical Masks:
The use of surgical masks in other situations where respiratory secretions might be spread by the airborne route must be considered along with the use of face protection following SICPs. Surgical masks being worn must be changed when contaminated or wet with breath moisture or if damaged/torn. Other face protection, e.g. eye protection provided by goggles or visors, may be required if there is a risk of mucosal splashing to the face as a result for example, coughing, sneezing or aerosol generating procedures.

Gloves and aprons:
- Disposable gloves and plastic aprons must be put on and worn during care activities and where there will be contact with the patient or their immediate environment
- The use of a disposable fluid repellent gown maybe more appropriate in order to gain more protection including the arms for specific infections. Advice should be sought from the IPCT.
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Good practice points:
- Supplies of PPE must be available at the entrance to single or cohort rooms.
- Aprons and gloves must be put on before undertaking care activities.
- No outer coats to be worn.
- PPE must be removed immediately upon leaving the room followed by hand washing.
- PPE must be changed between different procedures and care activities including gloves.
- PPE must be changed and hand hygiene performed between contacts with every patient, including other patientd being cared for under contact precautions within the same area.
- Safe disposal of PPE is essential immediately following removal.

9.2.5. Management of Care Equipment
Care equipment must be given additional consideration in order to prevent the spread of infectious agents that maybe contaminating items.
- Equipment must be allocated to individuals being cares for under airborne precautions e.g. blood pressure cuffs.
- Equipment must not be shared with others unless effectively decontaminated first.
- Items of equipment must be intact. Items that are not intact must be removed and replaced with intact items.
- Where possible use single use only disposable products.

9.2.6. Control of the Environment
Care of the environment must be given additional consideration in order to prevent the spread of infectious agents that might be contaminating items. Please refer to the Health Board 232 – Control of the Environment/Environmental cleanliness Policy and Procedure.
- The environment must be cleaned at least daily and when visibly contaminated. Particular attention must be given to frequently touched items e.g. door handles, bed tables etc.
- An increase in frequency must be considered particularly if patients are producing copious amounts of respiratory secretions.
- The environment must be clutter free to allow for effective cleaning.

- Equipment for cleaning must follow the Health Board colour coded cleaning system. These items must be clean, fit for purpose and decontaminated and/or disposed of appropriately.
- Terminal cleaning of the environment MUST be performed prior to use by any other patient.

9.2.7. Safe Management of Linen

Linen that could be contaminated must be managed safely in order to avoid cross transmission of infectious agents. They should be bagged following the Health Board 154 - Management of Linen Policy;

- Place contaminate linen into an alginate bag at the point of removal. DO NOT carry linen out of the room.
- Place alginate bag in appropriate colour coded bag.
- Remove gloves and wash hands.
- Communicate with others who may handle linen to ensure they take appropriate precautions.

9.2.8. Management of blood and body fluid spillage

All body fluid spillages must be cleaned and decontaminated following the Health Board 230 - Management of Body Fluid Policy.

9.2.9. Safe Management of Waste

All waste must be segregated and disposed of in accordance with 258 – Waste Management Policy.

- Waste that could be contaminated with small particles in the respirable size range must be managed safely in order to avoid cross infection.
- All waste generated from an infected or suspected of being infected patient must be disposed of into orange clinical waste bags (acute setting) or appropriate colour waste bags for contaminated waste.

9.2.10 Occupational exposure management

Occupational exposure management is essential for the protection of healthcare workers and relevant immunisation is an essential consideration when caring for those individuals with diseases spread by the airborne route;

- Ensure occupational immunizations are up to date
- Report and manage occupational exposure incidents immediately
- Non immune healthcare workers and those who are pregnant should not provide any close care for individual with specific infectious agents transmitted via the airborne route e.g. chickenpox and measles. Advice must be sought from Occupational Health for immunization, exclusion advice and post exposure guidance

10. DROPLET PRECAUTIONS PROCEDURE

10.1. What are droplet precautions?

Droplet precautions are a set of infection control measures which are designed specifically to prevent and control the transmission of infectious agents spread by small droplets to patients and healthcare workers during provision of care.

These precautions include;

- Patient placement/Isolation
- Respiratory hygiene/cough etiquette
- Hand hygiene

- Use of personal protective equipment (PPE)
- Care of equipment and environment including decontamination
- Management of body fluid spillage
- Cleanliness of the environment
- Safe handling of linen
- Safe handling of waste
- Occupational exposure management (including sharps injuries).

10.1.1. Why are droplet precautions important within the health and social care settings?

It is important to prevent infectious agents that could be present in, for example, the respiratory tract of individuals being transported via droplets to others and resulting in HCAIs.

10.1.2. What is the rationale for droplet precautions?

Droplet precautions are required to prevent the transmission of infectious agents via droplets and to minimize HCAIs. It is essential to apply the relevant infection control precautions during any relevant health and social activity. Due to the distance that droplets can travel from infected respiratory tracts, which depends on a number of factors including their size, speed, density and a number of additional environmental factors such as temperature, humidity etc, the precautions described are pivotal. Droplet transmission is defined as the transfer of a large droplet (>5um) from the respiratory tract of an infected individual directly onto a mucosal surface or conjunctivae of another individual. Due to the comparative large size of the particles it is accepted that droplets when dispelled only travel short distances through the air, e.g. less than 3 feet (1 metre away). This distance has been used as an effective measure and prevention measures based on this have been shown to be effective. The activity, which resulted in the droplet expulsion from the respiratory tract, affects this distance of spread and therefore has to be considered when precautions are being taken.

Infected individuals can cause respiratory droplets to be expelled as a result of a number of human activities such as coughing, sneezing and even talking. They can also be a risk during certain healthcare procedures such as endotracheal intubation and suctioning.

10.1.3. When are droplet precautions required?

The need for droplet precautions will vary depending on the patient/client/residents, the setting and the infectious agent (please refer to Appendix 1) and the procedures/activities being undertaken.

For example, highly dependent in-patient areas may require different considerations to a mental health setting.

Droplet precautions are required in all health and social care settings when a patient/client/resident is known or suspected to be infected/colonized with certain infectious agents or epidemiologically important organism that can be spread by the droplet route.

These include precautions to be taken with those with active infections, who are incubating an infectious disease, who are asymptomatic but suspected to be infectious and those who are colonized with pathogenic micro-organisms

10.2. **Standard Infection prevention and control DROPLET precautions**

10.2.1. Patient placement/isolation

Patient placement/isolation requires a risk assessment in order to determine the most appropriate placement for the patient. This will depend on;

- The infectious agent
- The patient and their overall condition e.g. a productive cough
- The area the patient is being cared for. This includes the potential for adverse outcomes in others and the availability of single rooms.
- The procedure/activities being undertaken.

Patients with certain known/suspected infections requiring droplet precautions should be placed in a single room with ensuite facilities as soon as possible. The door to this room MUST remain closed.

NB Certain conditions may require specialist monitoring and specialist isolation rooms e.g. Severe Acute Respiratory Syndrome (SARS).

If there are no specialised isolation rooms available then placement decisions must be performed with local risk assessments with support from the IPCT and Consultant Microbiologist and may include;

- Placement in a room with ensuite facilities. Door MUST be closed
- Placement in a single room with no ensuite facilities. The door MUST remain closed.
- The room must be ventilated if possible via an open window to allow for the exchange of air. The patient should wear a surgical mask when in close contacts with others.
- Cohorting – where cohorting is the only option this should be considered based on placing those with the same known/suspected infection in the same designated area. This approach is particularly relevant when there are increased numbers of cases e.g. influenza
- If cohorting those with the same infection is not possible avoid placing the infected patient with those who are immunocompromised or within long stay facilities such as care homes, IPCT will advice
- Cohorted patients must be at least 3 feet away from each other.

10.2.2. Hand Hygiene

Hand hygiene is essential particularly for droplet precautions. Please refer to the Health Board 149 - Hand Hygiene Policy.

10.2.3. Respiratory Hygiene and Cough Etiquette

Reinforce good respiratory hygiene with the patient at all times and assist as necessary;

- Cover nose and mouth with disposable single-use tissues when sneezing, coughing, wiping or blowing noses.
- Dispose of all tissues immediately into a orange clinical waste bin.
- Offer and encourage patient to wash hands after coughing, sneezing, using tissues, or after contact with respiratory secretions and contaminated objects.
- Keep hands away from the mucous membranes of the eyes and nose. Certain patients(e.g. the elderly and children) may need assistance with containment of respiratory secretion; those who are immobile will need a receptacle (e.g. a small plastic orange clinical waste bag) readily at hand for the immediate disposable of used tissues and should be offered hand hygiene facilities
- Instruct all affected patientsand any visitors or cares on the steps described.

10.2.4. Personal Protective Equipment PPE

PPE is essential in preventing HCAIs particularly for contact precautions. Please refer to the Health Board 151 - Personal Protective Equipment Policy.

Masks and other facial protection:

- A surgical mask is one of the key precautions to be considered when providing care in close contact. It should be put on before care is provided i.e. on entry into the room or cohort area.
- Masks are not expected to be routinely worn, e.g. when the health care worker has known or proven immunity, or close contact care is not being provided.
- Respiratory masks (FFP3) are not generally expected to be worn for droplet precautions. These masks would only be required when delivering care to those with additional epidemiological significance and/or transmissible by the airborne route. Please contact IPCT for advice.
- Face/eye protection is required if there is a risk of mucosal splashing to the eyes as a result of coughing/sneezing.

Gloves and aprons:

- Disposable gloves and plastic aprons should be put on and worn during care activities and where there will be contact with the patient/client/resident or their immediate environment.
- The use of a disposable fluid repellent gown might be more appropriate in order to gain more protection including the arms for specific infections. Advice should be sought from the IPCT.

Good practice points:

- Supplies of PPE must be available at the entrance to single or cohort rooms
- Aprons and gloves must be put on before undertaking care activities
- No outer coats to be worn
- PPE must be removed immediately upon leaving the room followed by hand washing
- PPE must be changed between different procedures and care activities. This is particularly important for gloves.
- PPE must be changed and hand hygiene performed between contact with every patient, including others being cared for under contact precautions within the same area.
- Safe disposal of PPE is essential immediately following removal.

10.2.5. Management of Care Equipment

Care equipment must be given additional consideration in order to prevent the spread of infectious droplets/respiratory secretions that may be contaminating items.

- Equipment must be allocated to individuals being cares for under contact precautions e.g. blood pressure cuffs
- Equipment must not be shared with others unless thoroughly decontaminated first
- Items of equipment must be intact. Items that are not intact must be removed and replaced with intact items.
- Where possible use single use only disposable products

10.2.6. Control of the Environment

Care of the environment must be given additional consideration in order to prevent the spread of infectious agents that might be contaminating items. Please refer to the Health Board 232 – Control of the Environment/Environmental cleanliness Policy and Procedure.

- The environment must be cleaned at least daily or when visibly contaminated. Particular attention must be given to frequently touched items e.g. door handles, bed tables etc.
- An increase in frequency must be considered particularly if patients are producing copious amounts of respiratory secretions
- The environment must be clutter free to allow for effective cleaning

- Equipment for cleaning must follow the Health Board Colour coded Cleaning system. These items must be clean, fit for purpose and decontaminated and/or disposed of appropriately
- Terminal cleaning of the environment MUST be performed prior for use by any other patients/clients/residents.

10.2.7. Safe Management of Linen

Linen that could be contaminated must be managed safely in order to avoid cross transmission of infectious agents. They should be bagged following the Health Board 154 - Safe Management of Linen Police.

- Place contaminate linen into an alginate bag at the point of removal. DO NOT carry linen out of the room.
- Place alginate bag in appropriate colour coded bag.
- Remove gloves and wash hands.

Communicate with others who may handle linen to ensure they take appropriate precautions.

10.2.8. Management of blood and body fluid spillage

All body fluid spillages must be cleaned and decontaminated following the Health Board 230 - Management of Body Fluid Policy.

10.2.9. Safe Management of Waste

All waste must be segregated and disposed of in accordance with 258 – Waste Management Policy.

- Waste that could be contaminated must be managed safely in order to avoid cross infection of infectious agents
- All waste generated from an infected or suspected of infected patients should be disposed of into orange clinical waste bags (acute setting) or appropriate colour waste bags for contaminated waste.

10.2.10. Why is occupational exposure management an additional consideration for airborne precautions?

Occupational exposure management is essential for the protection of healthcare workers and relevant immunisation is an essential consideration when caring for those individuals with diseases spread by infectious droplets;

- Ensure occupational immunizations are up to date e.g. influenza
- Report and manage occupational exposure incidents immediately, including any mucosal splashing

11. CATEGORY 4 INFECTIOUS DISEASES

The Consultant Microbiologist and the IPCT must be informed immediately if a patient has a suspected or diagnosed with a Category 4 Infectious Disease. The Advisory Committee on Dangerous Pathogens ACDP Hazard Group 4 VHF viruses are;

ARENAVIRADAE	BUNYAVIRIDAE
Old World arenaviruses; • Lassa • Lujo New World arenaviruses;	Nairoviruses • Crimean Congo haemorrhagic fever

• Chapare • Guananto • Junin • Machupo • Sabia	
FLAVIVIRIDAE • Kyasanur forest disease • Alkhuma haemorrhagic fever • Omsk haemorrhagic fever	FILOVIRIDAE • Ebola • Marburg

The patient must have strict isolation and must be transferred as soon as possible to a High Security Infectious Disease Unit (London or Newcastle) shortly after diagnosis, or on high suspicion of such an infectious disease.

- Royal Free Hampstead NHS Trust London – Telephone (24hrs, ask for Infectious disease Physician on call) 020 7794 0500 0r 0844 8480700 (local rate number for when calling from outside London)
- The Newcastle upon Tyne Hospitals NHS Foundation Trust, Newcastle – Telephone (24 hors, ask for Infectious Diseases Physician on call 0191 233 6161

Reference Laboratories for VHF screen

- Microbiology laboratories – Porton Down
  Health Protection Agency
  Porton Down
  Salisbury
  Wiltshire
  SP4 0JG
  Telephone; 01980 612100

- Microbiology Services division – Colindale
  62 Colindale Avenue
  Colindale
  London
  NW9 5HT
  Telephone 0208 200 4400 or 0208 200 6858 (24 hours).

12. ROLES / RESPONSIBILITIES / FUNCTIONS

It is important that the following key staff understand their individual roles in promoting compliance with TBPs.

12.1. Chief Executive

The Chief Executive has ultimate responsibility for infection prevention and control within Hywel Dda Health Board. This responsibility is delegated to the Director of Nursing and Midwifery.

12.2. Executive Director and Senior Managers

The Director of Nursing and Midwifery has delegated responsibility for infection prevention and control in the Health Board and along with senior managers must be familiar with the TBPs policy and support the implementation of the policy throughout the organisation.

12.3. **County Management Team**
The County Management Team is responsible for receiving reports and monitoring compliance with TBPs. Identify areas of non-compliance and initiate appropriate action.

12.4. **Senior Nurse - Infection Prevention and Control**
Operational responsibility for infection prevention and control within the Health Board lies with the Senior Nurse Infection Prevention & Control who is responsible for supporting the County IP&CTs in implementing the TBPs policy and monitoring of compliance. The Senior Nurse of IP&C is responsible for ensuring mandatory training includes education on TBPs.

12.5. **County Infection Prevention & Control Team**
The County IP&CT will promote implementation of TBPs in clinical practice and will conduct regular compliance audits for feedback to wards/departments and County management teams.

12.6. **Ward / Unit Managers / Department Leads**
Ensure all staff are familiar with the TBPs policy and ensure the policy is complied with. They are also responsible for conducting regular quality audits e.g. hand hygiene audits, and equipment cleaning audits ensuring that areas of non-compliance are feedback to clinical teams and actions addressed.
It is the responsibility of the person in charge to ensure that the care area is safe for practice and this includes environmental cleanliness/maintenance. The person in charge has the authority to act if this is deficient.

12.7. **All Health Care Workers**
All health care workers are required to be familiar with the TBPs policy and comply with its contents and are responsible for informing the IP&CT and their manager immediately of any concerns related to poor compliance.

13. TRAINING
Infection Prevention and Control Training is mandatory every 3 years and contents of this policy are included in this training. Infection Prevention and Control staff perform this training and keep attendance records; however, it is the line managers who are responsible to ensure ALL staff attend this training at the required time.

14. IMPLEMENTATION
Implementation of policies and procedures can only be effective if adequate evaluation and monitoring is used to check the system and ensure any shortcomings are identified and dealt with. Locally, Managers are responsible for initiating an ongoing monitoring process within their areas of responsibility.

From an organisation perspective, the Infection Prevention and Control Committee shall be responsible for monitoring that this policy and that appropriate actions are being taken to maintain patient safety.

15. FURTHER INFORMATION
Health Protection Scotland – Transmission Based Precautions Policy 2012

National Institute for Clinical Excellence 2012 ‘Infection: prevention and control of healthcare-associated infections in primary and community care: Clinical Guideline

methods, evidence and recommendations'.

National Clinical Guideline Centre at The Royal College of Physicians; London

16. LIST OF POLICIES TO BE READ IN CONUNCTION WITH THIS POLICY

The practice recommendations set out are drawn from appraisals of the available professional literature on infection prevention and control, conducted by colleagues at Health Protection Scotland which can be found via the link to the Health Protection Scotland (HPS) web site
http://www.hps.scot.nhs.uk/HCAIic/ic/standardinfectioncontrolprecautions-sicps.aspx

This document should be read in conjunction with the following Health Board Policies:
149 - Hand Hygiene Policy,
151 - Personal Protective Equipment Policy
154 - Management of Linen Policy
187 - Exposure Management including Sharps Injuries
236 – Outbreak Management Policy
258 – Waste Management Policy
354 - Policy Standard Infection Control Precautions (SICPs), ,
230 – Policy for the Management of Blood and Body Fluids,
152 – Policy for the Management of Viral Haemorrhagic Fever (VHF).
232 – Control of the Environment/Environmental cleanliness Policy and Procedure.

17. REVIEW

This Policy will be reviewed after 3 years, or sooner, as required.

18. APPENDIX 1 – INFECTIOUS AGENTS OR DISEASE WARRANTING TRANSMISSION BASED PRECAUTIONS IN ADDITION TO STANDARD INFECTION CONTROL PRECAUTIONS

Infection Prevention & Control

Transmission Based Precautions (TBPs)

Contact Precautions

- **Abscess**
- ***C.difficile* (consider Airborne route if patient has explosive diarrhoea and excessive flatulence)**
- **Diarrhoea with suspected infective cause**
- **Diphtheria (cutaneous)**
- **Epiglotitis**
- **Hepatitis type A & E**
- **Herpes Simplex Virus**
- **Human metapneumovirus**
- **Impetigo**
- **Lice – head, body, pubic**
- **Multi-drug resistant organism(skin/body fluid)**
- **Scabies**
- **Staphylococcal disease – skin, wound, burns**
- **Herpes Zoster Virus (shingles)**

Contact and / or Droplet

- **Adenovirus – resp infection in paediatrics**
- **Bronchiolitis**
- **Diphtheria – pharyngeal**
- **Herpes zoster (shingles)**
- **Influenza – seasonal / pandemic**
- **Whooping cough**
- **Meningitis**
- **Mumps**
- **Multi-drug resistant organism (respiratory)**
- **Viral haemorrhagic fevers**
- **Mycoplasma atypical pneumonia**
- **Parvovirus B19**
- **Pneumonia – adenovirus**
- **Rubella**
- **Respiratory synctival virus**
- **Rotavirus**
- **Streptococcus group A disease i.e. erysipelas, tonsilitis, scarlet fever, necrotising fascitis, puerperal fever**

Airborne

- **Measles**
- **Varicella (chickenpox)**
- **Norovirus**
- **Multi-drug resistant organism (respiratory)**
- **Mycobacterium tuberculosis- pulmonary**
- **Severe acute respiratory syndrome (SARS)**

NB. Consider *C.difficile* in this transmission category if patients have explosive diarrhoea and excessive flatulence.

19. APPENDIX 2 – ORGANISMS AND DISEASES OR HCAI IMPORTANCE AND APPROPRIATE TBPS

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Adenovirus	Respiratory tract infection	Droplet	√			√	For AGP * only		CDC Information • http://www.cdc.gov/adenovirus/hcp/prevention-treatment.html Requirements of precautions may be extended due to prolonged shedding* of virus, generally until 48 hours following cessation of symptoms
	Conjunctivitis	Contact							

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Bordatella Pertussis	Whooping cough	Droplet	√			√ Until patient has completed 5 days of antibiotics	For AGP * only	√	PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/WhoopingCough/ DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf Until 5 days of the commencement of antibiotic therapy. If untreated patient infectious for up to 3 weeks. Post exposure prophylaxis for household contacts and in rare circumstances may be indicated for HCWs following prolonged exposure to respiratory secretions.
Chlamydia pneumoniae	Pneumonia	Droplet	√			√	For AGP * only		

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Clostridium difficile	*Clostridium difficile* associated disease	Contact	√						• PHE C diff management link - http://www.hpa.org.uk/webc/HPAwebFile/HPAweb_C/1317138914904 • HPA Good Practice – http://www.hpa.org.uk/webc/HPAwebFile/HPAweb_C/1194947384014 Precautions remain until patient is 48 hours symptom free. Specimens are **not** required for clearance
Coronavirus	Respiratory tract infection	Droplet	√			√	For AGP * only	√	
Corynebacterium diphtheri	Cutaneous diphtheria	Contact	√					√	

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
	Pharyngeal diphtheria	Droplet	√			√	For AGP * only	√	DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf Until negative. Patient considered negative when two cultures (Nasal Pharyngeal Aspirate) are taken 24 hours apart.
GI infections E.g. Salmonella Campylobacter		Contact	√					√	Varies depending on the organism seek local guidance from local Infection Control/Health Protection team. Many enteric pathogens are notifiable diseases consult local Health Protection Team

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Haemophilus influenza type B	Epiglottitis Meningitis	Droplet	√			√ Until patient has completed 24 hours of antibiotics	For AGP * only	√	DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf Until 24 hours into the course of corrective antibiotic therapy.
Hepatitis, viral. Types A&E	Hepatitis	Contact		√				√	• HAV - http://www.hpa.org.uk/webc/HPAwebFile/HPAweb_C/1259152095231 Hep A - For duration of hospital stay Hep E - For duration of hospital illness. Specifically for nappy wearing infants/incontinent adults.

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Herpes Simplex (HSV1 and 2)	Oral herpes, genital herpes, neonatal disseminated herpes	Contact		√		√			Can infect oral mucosa (HSV1) or genital tract (HSV 2). Primary and recurrent infections can occur and duration of precautions will vary but usually until lesions or cold sores disappear. Risk to exposed infants delivered vaginally or by C-section and if mother has active infection and membranes have been ruptured for more than 4-6 hours
Herpes Zoster (Varicella zoster virus)	Shingles – skin	Contact	√ If lesions cannot be covered						• http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/Shingles/ Infectious until vesicles are dry usually 5-7 days this may be extended for immunocompromised individuals. Disseminated disease may require an increase in the duration of the precautions. Susceptible health/social care workers should not give direct care if immune care givers are available. Immune caregivers no additional precautions, non immune may require surgical mask in disseminated disease
	Shingles – respiratory tract	Droplet/airborne	√			√	For AGP * only		

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Influenza virus	Influenza	Droplet		√		√	For AGP * only	√	DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf DH UK Pandemic Influenza Preparedness Strategy 2011 • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/213717/dh_131040.pdf 5 days except in immunocompromised persons. Use of vaccine or antiviral drugs may be considered. Avoid placing infected individuals with immunocompromised patients.

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Measles virus	Measles	Droplet / airborne			√	√	For AGP * only	√	PHE Measles guidance • http://www.hpa.org.uk/webc/HPAwebFile/HPAweb_C/1274088429847 • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/MMR/ DH Guidelines • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf Precautions remain until 4 days after onset of rash. For immunocompromised individuals this is increased for the duration of illness. Susceptible health/social care workers should not enter the room if immune care givers are available. Exposed susceptible care givers may require post exposure vaccine
Multi drug resistant organisms	Various clinical syndromes, dependent upon organism and patient profile	Contact/Air borne/		√					PHE Carbapenemase Resistant Enterococci guidance • http://www.hpa.org.uk/webc/HPAwebFile/HPAweb_C/1317140378646

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Mumps virus	Mumps	Droplet		√		√	For AGP * only	√	DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/MMR/ Until approximately 9 days following appearance of symptoms in hospital. Some evidence that this can be reduced to 5 days in community settings for previously healthy individuals. Non immune HCW should not provide direct care

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Mycobacterium tuberculosis	Pulmonary/ laryngeal TB	Airborne			√ Until patient has received 14 days effective treatment OR If patient has MDR or XDR TB		For AGP* only. Until patient has received 14 days effective treatment OR If patient has MDR or XDR TB	√	NICE TB Guidelines 2011 • http://www.nice.org.uk/nicemedia/live/13422/53642/53642.pdf Discontinue precautions only when patient is on effective therapy, condition is improving and has 3 negative sputum smears for acid fast bacilli (AFB) collected on 3 consecutive days. MDR TB cases always seek guidance when suspected/ confirmed cases further information (*link to guidance*) There are some exceptions to precaution requirements and local Infection Control/Health Protection/ TB teams must be consulted
	Extra pulmonary TB	Contact		√		√	For AGP* only	√	
Mycoplasma	Pneumonia	Droplet		√		√	For AGP* only		Precautions remain for duration of hospital stay or until symptoms resolve. Patients can be infectious for up to 13 weeks.

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Neisseria meningitides	Meningitis Meningococcal septicaemia	Droplet	√ Until patient has completed 24 hours of antibiotics			√ Until patient has completed 24 hours of antibiotics	For AGP * only	√	DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf Until 24 hours into the course of corrective antibiotic therapy. Post exposure chemoprophylaxis based on local risk assessments for exposed HCW as per Infection Control Team / Health Protection Team advice. Household contacts are given prophylactic antibiotics to eliminate carriage and prevent clinical illness,
Norovirus	Diarrhoea and vomiting	Contact/ droplet	√			Only if risk of splashing or spillage		√	PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/Norovirus/Guidelines/ •
Parainfluenza virus	Respiratory tract infection	Droplet	√			√	For AGP * only		

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Parvovirus B19	Erythema infectiosum/ 'slapped cheek' syndrome	Droplet		√		In acute setting, up to 7 days from onset of symptoms	For AGP * only		PHE Factsheet • http://www.hpa.org.uk/webw/HPAweb&Page&HPAwebAutoListName/Page/1203084375945 A common childhood infection lasting 2- 3 days followed by the rash on the cheeks. In adults can be associated with athralgia Non-infectious when the rash appears. If the patient has a chronic disease or is immunocompromised maintain precautions for the duration of illness or whilst patient is hospitalised. Advice should be sought from an Infection Control/Disease/ Public Health Physician or Consultant Microbiologist when this disease is identified or suspected in pregnancy

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Respiratory syncitial virus (RSV)	Respiratory tract infection	Droplet		√		√	For AGP * only		DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/RespiratorySyncytialVirus/Guidelines/ Duration of symptoms (whilst in acute care setting specifically) Particularly affects young children, infants and immunosuppressed patients. Highly transmissible in paediatrics
Rhinovirus	Respiratory tract infection	Droplet		√		√	For AGP * only		
Rotavirus	Gastroenteritis	Droplet/contact		√		Only if risk of splashing or spillage			

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Rubella virus	Rubella 'German measles'	Droplet		√		*	For AGP * only	√	DH guidance • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/MMR/ • Until 7 days after onset of rash. Susceptible HCW should not provide direct clinical care
Staphylococcus aureus	Scalded skin syndrome	Contact	If lesions cannot be covered					√	
Meticillin resistant *Staphyloco*	Infection Colonisation**	Contact		√				√	MRSA Screening • http://wales.gov.uk/topics/health/cmo/publications/cmo/2013/mrsascreening/?lang=en Guidelines • http://www.his.org.uk//resource_library/mrsa.cfm?cit_i

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
									d=435&FAArea1=customWidgets.content_view_1&usecache=false
Streptococcus pyogenes (Group A Strep)	Respiratory	Droplet	√			√ Until patient has completed 24 hours of antibiotics	For AGP * only		

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
	Wound, bacteraemia, meningitis, other metastatic infection	Contact	√					√	PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/StreptococcalInfections/Guidelines/ GAS guidance *Guidelines for prevention and control of group A streptococcal infection in acute healthcare and maternity settings in the UK*
Streptococcus pneumoniae	Respiratory	Droplet	√			√ Until patient has completed 24 hours of antibiotics	For AGP * only	√	PHE guidance • http://www.hpa.org.uk/Topics/InfectiousDiseases/InfectionsAZ/Pneumococcal/GuidelinesPneumococcal/ •
	Wound, bacteraemia, meningitis, other metastatic infection	Contact	√					√	

Pathogen	Clinical condition	Precaution category	Optimal Placement while patient is considered infectious			Respiratory precaution while patient is considered infectious		Notifiable	Useful links/additional comments
			Single	Single ambulance transfer	Single room with negative pressure	Surgical facemask	FFP3		
Varicella virus	Chickenpox	Droplet/airborne			√	√	For AGP * only	√	DH Guidelines • https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/239274/Green_Book_updated_110913.pdf Viral rash in Pregnancy • http://www.hpa.org.uk/webc/HPAwebFile/HPAweb_C/1294740918985 Until all lesions are dry and crusted. In immunocompromised individuals with varicella pneumonia prolonged precautions may be required. Susceptible health/social care workers (e.g. those who are pregnant or immunocompromised) should not enter the room if immune care givers are available.

*Aerosol generating procedures

20. APPENDIX 3 – SUMMARY OF PRECAUTIONS TO MINIMISE THE SPREAD OF INFECTIONS BY THE DROPLET ROUTE

GIG CYMRU NHS WALES | Bwrdd Iechyd Prifysgol Hywel Dda University Health Board

THIS PATIENT IS IN ISOLATION

THIS PATIENT IS IN ISOLATION DUE TO AN INFECTION CAUSED BY THE DROPLET ROUTE

Placement and transfers

- Place person in a single room ensuite facilities and keep the door closed, unless other issues prevent this on risk assessment e.g. patient safety.
- Communicate isolation information on precautions being taken to the staff /patient/client and visitors without breaching confidentiality.
- Avoid transfers unless essential for medical reasons. If essential, a surgical mask should be worn by the patient.
- Check the need for continued precautions / isolation and only cease precautions on the advice of specialists in infection prevention and control/policy guidance.

Respiratory hygiene / Cough etiquette

- Cover mouth and nose. Use disposable tissues – dispose of tissues immediately. Wash hands. Avoid touching face with hands after coughing or sneezing.

Personal protective equipment

- Ensure PPE is readily available and put on and removed immediately before and after care activity in the patient / client area. Use disposable gloves and plastic apron during care activities. Use a surgical mask when providing close care.

Ensure that supplies of PPE and hand hygiene equipment are available at the entrance single room / cohort areas.

Hand hygiene

- Perform hand hygiene before and after providing care and after removal of PPE.

Management of care equipment

- Allocate equipment to individuals where possible. Decontaminate equipment following manufacturer's guidance/local instruction before and after use and on terminal cleaning. Use disposable items where available and dispose of items appropriately.

Control of the environment

- Ensure the care environment is clutter free, intact and clean, paying particular attention to frequently touched and horizontal surfaces surrounding the patient / client. Terminally clean the environment following end of precautions / isolation.

Safe management of linen

- Ensure safe handling of linen i.e. wear PPE, wash hands on removal, bag infected linen in alginate bags, place alginate bags in the appropriate secondary colour coded linen bag.

Safe disposal of waste

- Ensure safe handling of waste i.e. wear PPE, wash hands on removal. Place all contaminated items into orange clinical waste bag.

Occupational exposure management

- Report and manage occupational exposure incidents immediately. Ensure occupational immunisations are up to date e.g. influenza

Infection Prevention and Control Team Feb 2014

21. APPENDIX 4 - SUMMARY OF PRECAUTIONS TO MINIMISE THE SPREAD OF INFECTIONS BY CONTACT

GIG CYMRU NHS WALES | Bwrdd Iechyd Prifysgol Hywel Dda University Health Board

THIS PATIENT IS IN ISOLATION

THIS PATIENT IS IN ISOLATION DUE TO AN INFECTION CAUSED BY THE CONTACT ROUTE

Placement and transfers

- Place person in a single room with ensuite facilities and keep the door closed, unless other issues prevent this on risk assessment e.g. safety of patient.
- Communicate information on precautions being taken to the staff/patient/client and visitors without breaching confidentiality.
- Avoid transfers unless essential for medical reasons.
- Check the need for continued precautions / isolation and only cease precautions on cessation of symptoms and / or on the advice of specialists in infection prevention and control/policy guidance.

Personal protective equipment

- Ensure PPE is readily available and put on and removed immediately before and after care activity in the patient / client area. Use disposable gloves and plastic apron during care activities

Ensure that supplies of PPE and hand hygiene equipment are available at the entrance single room / cohort areas.

Hand hygiene

- Perform hand hygiene before and after care and following removal of PPE.

Management of care equipment

- Allocate equipment to individuals where possible. Decontaminate equipment following manufacturer's guidance/local instruction before and after use and on terminal cleaning. Use disposable items where available and dispose of items appropriately.
-

Control of the environment

- Ensure the care environment is clutter free, intact and clean, paying particular attention to frequently touched and horizontal surfaces surrounding the patient / client. Terminally clean the environment following end of precautions / isolation.

Safe management of linen

- Ensure safe handling of linen i.e. wear PPE, wash hands on removal, bag infected linen in alginate bags, place alginate bags in the appropriate red colour coded linen bag.

Safe disposal of waste

- Ensure safe handling of waste i.e. wear PPE, wash hands on removal. Place all contaminated items into orange clinical waste bag.

Occupational exposure management

Report and manage occupational exposure incidents immediately. Ensure occupational immunisations are up to date e.g. influenza.

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22. APPENDIX 4 - SUMMARY OF PRECAUTIONS TO MINIMISE THE SPREAD OF INFECTIONS BY THE AIRBORNE ROUTE

THIS PATIENT IS IN ISOLATION

THIS PATIENT IS IN ISOLATION DUE TO AN INFECTION CAUSED BY THE AIRBORNE ROUTE

Placement and transfers

- Place person in a single room with ensuite facilities and keep the door closed, unless other issues prevent this e.g. patient safety.
- Communicate information on precautions being taken to the staff/patient/client and visitors without breaching confidentiality.
- Avoid transfers unless essential for medical reasons. If essential, a surgical mask should be worn by the patient
- Check the need for continued precautions / isolation and only cease on the advice of specialists in infection prevention andcontrol/policy guidance.

Respiratory hygiene / Cough etiquette

- Cover mouth and nose. Use disposable tissues – dispose of tissues immediately. Wash hands. Avoid touching face with hands after coughing or sneezing.

Personal protective equipment

- Ensure PPE is readily available and put on and removed immediately before and after care activity in the patient / client area. Use disposable gloves and plastic apron during care activities. Use a FFP3 mask as required when providing care and removed outside the isolation room.FFP3 respirator masks are required with certain infections e.g. Active pulmonary TB is present and procedures are undertaken. Refer to your infection prevention and control / health protection team.

Ensure that supplies of PPE and hand hygiene equipment are available at the entrance single room / cohort areas.

Hand hygiene

- Perform hand hygiene before and after providing care and after removal of PPE.

Management of care equipment

- Allocate equipment to individuals where possible. Decontaminate equipment following manufacturer's guidance/local instruction before and after use and on terminal cleaning. Use disposable items where available and dispose of items appropriately.

Control of the environment

- Ensure the care environment is clutter free, intact and clean, paying particular attention to frequently touched and horizontal surfaces surrounding the patient / client. Terminally clean the environment following end of precautions / isolation.

Safe management of linen

- Ensure safe handling of linen i.e. wear PPE, wash hands on removal, bag infected linen in alginate bags, place alginate bags in the appropriate secondary colour coded linen bag.

Safe disposal of waste

- Ensure safe handling of waste i.e. wear PPE, wash hands on removal. Place all contaminated items into orange clinical waste bag.

Occupational exposure management

- Report and manage occupational exposure incidents immediately. Ensure occupational immunisations are up to date e.g. influenza, chickenpox.

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