Infection Control Guiding Principles for Buildings
Acute Hospitals and Community Healthcare Settings

Policy [ ] Procedure [ ] Protocol [ ] Guideline [x]

Insert Service Name(s), Directorate and applicable Location(s):

All acute hospitals

Title of PPPG Development Group:	Antimicrobial Resistance and Infection Control (AMRIC) Implementation Team
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INITIATION

1.1 Purpose

This document has been developed to support consideration of infection prevention and control requirements as central in designing new builds, refurbishing old builds, adding extensions, upgrading existing facilities and undertaking any building work that will impact on how care is provided to patients both in acute hospitals and residential settings in the community. It has been adapted from the 'Infection Prevention and Control Building Guidelines for Acute Hospital, SARI 2009' [1]. For the purpose of this document, the term 'hospital' will include acute hospitals and all healthcare settings where a similar level of clinical care is provided. For ease of use, the recommendations will be divided into four sections:

Part 1 – Governance
Part 2 – Acute hospital settings
Part 3 – Community healthcare settings
Part 4 – Other healthcare settings

By way of implementing this guidance, it is anticipated that it will be shared by Estates to their planning, design and building teams and will be supported by clinical teams including IPC Teams. It will assist the design, re-design or refurbishment of hospitals to reduce and prevent the occurrence of HCAIs and improve patient safety.

1.2 Scope

1.2.1 Target Users

This guideline is intended for use in planning, designing, building and refurbishing any healthcare setting. As such, it is expected to be used by Estates managers and planners, hospital managers, Chief Officers Community, Community services managers, clinical staff and IPC professionals, quality and risk managers, Design Teams & Construction Contractors.

1.2.2 Populations to whom it applies

All people that access healthcare in hospitals or community settings.

1.3 Objectives

To ensure infection prevention and control requirements are considered and incorporated as part of any new build, refurbishment or any internal works in HSE facilities.

1.4 Outcomes

To reduce and prevent the occurrence of HCAIs and improve patient safety, identify and mitigate all IPC risks and ensure compliance with the current IPC guidance and regulations.

1.5 PPPG Development Group

AMRIC Team and Estates and HCAI Clinical Advisory Group.

1.6 PPPG Development Governance Group

Antimicrobial Resistance and Infection Control Oversight Group.

1.7 Supporting Evidence

1.7.1 'Infection Prevention and Control Building Guidelines for Acute Hospital, SARI 2009'.
1.7.2 UK DH Building Notes https://www.gov.uk/government/collections/health-building-notes-core-elements
1.7.3 HFN 30 "Infection control in the built environment"
1.7.4 'Guidelines for the Prevention and Control of Infection from Water Systems in Healthcare Facilities' HPSC 2015
1.7.5 'National Guidelines for the Prevention of Nosocomial Aspergillosis' HPSC Jan 2018
1.7.6 'National Standards for infection prevention and control in community services' HIQA 2018
1.7.7 'National Standards for the prevention and control of healthcare-associated infections in acute healthcare services' HIQA 2017
1.7.8 'HBN 00-09 - Infection control in the built environment' DH 2009

1.7.9 Core elements Health Building Note 00-03: Clinical and clinical support spaces

1.8 Glossary of Terms

AMRIC – Antimicrobial Resistance and Infection Control.
CAG – Clinical Advisory Group.
CEO - Chief Executive Officer.
IPC – Infection Prevention and Control.
HBN – Health Building Note.
HCAI – Healthcare Associated Infection.
HIQA - Health Information Quality Authority.
HSE – Health Service Executive.
HTM - Health Technical Memoranda.

2.0 DEVELOPMENT OF PPPG

Prevention and control of healthcare associated infection and the management of antimicrobial resistance requires a multi-factorial approach. This includes adequate space and facilities in all areas to support basic infection prevention and control practice, including appropriate patient placement. The basic infection control practices that should apply in all healthcare at all times are referred to as Standard Precautions. There is a requirement for a high proportion of single *en-suite* rooms. Ideally, single rooms should be the norm in new build acute hospital facilities. However, it is appropriate to consider some provision for two-bed units to support care of patients for whom single room accommodation may be inappropriate or stressful. Where such provision is made, each patient should have his/her own toilet and shower facility.

A proportion of single rooms with specific requirements including ventilation controls are needed to support implementation of extra precautions for some people infected with or carrying certain types of bacteria or viruses. These extra precautions are referred to as Transmission Based Precautions. There are three categories of Transmission Based Precautions - Contact Precautions, Droplet Precautions and Aerosol Precautions. There is also a need for a proportion of single rooms with specific requirements including ventilation controls to provide protection to some people who are profoundly vulnerable to infection for a period of time. This is called Protective Isolation.

It is important that hospital designs allow for flexibility of use over time and planning for future service requirements. Hospital buildings are likely to have a life span of many decades, during which time, there are likely to be considerable advances in healthcare technology and changes in the way in which healthcare is delivered.

Single room isolation of people for infection prevention and control purposes is rarely appropriate in any non-acute hospital residential setting. However, single room accommodation is preferable for residents in long stay residential facilities as this may be the person's home for many years. Where appropriate provisions are made, the rate of falls in single patient rooms need not be higher than for multiple-bedded rooms [2]. Single rooms can facilitate visitors and family members to play a greater role in are of the person.

The most commonly required category of Transmission Based Precautions is Contact Precautions. A standard single patient room with *en-suite* sanitary facilities is sufficient to support implementation of Contact Precautions. [3].

Containment of certain bacteria and viruses that are spread by the airborne route such as tuberculosis, measles, chickenpox and influenza requires single patient rooms that are specifically designed to minimise airborne transmission. This requires airborne "source isolation". The requirement in this setting is that the system prevents the flow of air from the room to the hallway. This is because the air in the room is likely to carry pathogenic organisms that come from the person's airway. This is generally achieved by maintaining the room at negative pressure compared to the hallway and ensuring that the doors between the room and ante-room and between ante-room and hallway are maintained closed except when entering or leaving the room.

In addition, certain people with profound immune deficiency, such as may occur immediately following bone marrow transplantation, require airborne “Protective Isolation” in a room that protects them from exposure to unfiltered air. This is because ordinary air contains fungal spores, which are harmless to most people but can cause very serious disease in profoundly vulnerable people. The requirement in this setting is that the system prevents flow of unfiltered air, that is likely to contain fungal spores and other microorganisms, from the hallway or from outside the building into the room. This can be achieved by appropriate sealing of the room, by ensuring that the doors between the room and ante-room and between ante-room and hallway are maintained closed except when entering or leaving the room and by maintaining the air within the room at positive pressure relative to the hallway. Positive pressure is maintained by controlled inflow of air that is filtered to remove fungal spores and other microorganisms.

Rooms that allow for switching from negative pressure to positive pressure should be avoided. Such rooms have, in practice, resulted in frequent errors in relation to settings so that patients and staff are exposed to airborne infectious agents when the room intended for source isolation is inappropriately set to positive pressure or that vulnerable patients are exposed to fungal spores when a room intended for protective isolation is inappropriately set to negative pressure. Isolation rooms with ventilations systems that are switchable are not allowed in new installations. In existing installations, where older switchable systems still exist, there must be a strict Standard Operating Procedure prepared to advise staff of their use. These systems must be clearly labelled as per HTM guidance.

“Neutral pressure” rooms support both “Airborne Precautions”” for patients with airborne infections and “Protective Isolation” for patients with profound immune deficiency. They have advantages because they have this dual function. [4]

The number of airborne isolation rooms and the type of airborne isolation rooms required for a given hospital is dependent on case mix, local prevalence of infections requiring airborne isolation (particularly tuberculosis) and requirements for future emergency planning. A review of airborne isolation room requirements in hospitals in Florida, based on Health Resources and Service Administration critical benchmarks, concluded that large regional hospitals should have at least one airborne isolation room per 75 acute beds, other acute hospitals should have one per 150 beds, and that these should be located as close as possible to the emergency department [5].

The basic guiding principles include:

- Ensuring Infection Prevention and Control staff are central to every stage in designing new builds, refurbishing old builds, adding extensions, upgrading existing facilities and undertaking any building work that will impact on how care is provided to patients. The design and build should reflect the recommendations of the Infection Prevention and Control service.

- Patient accommodation should be designed in a way that addresses a number of requirements related to Infection Prevention and Control including:
  - Maximising patient comfort and dignity.
  - Ensuring ease of delivery of patient care.
  - Appropriate provision for family members and other visitors.
  - Minimising risk of transmission of microorganisms.
  - Adequate facilities for storage of equipment and supplies.
  - Adequate toilet and shower facilities.
  - Number, design and placement of facilities to manage commodes in terms of storage and cleaning.
  - Hand hygiene facilities – optimising design, visibility and location of wash hand sinks and location of alcohol hand rub dispensers.
  - Environmental cleaning and decontamination – location, storage, accessibility.
    Building services and plant should be designed to mitigate IPC risks (i.e. removal of dead legs, least moving parts, etc.) and to incorporate efficient and optimised maintenance regimes (easy access allowing routine flushing/testing).

The recommendations contained in this document are designed to minimise the risk of transmission of microbes for patients receiving care in hospitals and other healthcare settings.

2.1 Recommendations

Part 1 Governance

2.1 Planning and Governance

2.1.1 Planning and Design

2.1.1.1 Planning and design of new hospitals, or major hospital refurbishments, should take account of relevant UK Health Technical Memoranda (HTM), Health Building Notes (HBN), or an equivalent international guidance document that has been approved by HBS Estates.

2.1.1.2 Initial planning and design of all new builds, upgrades and refurbishments should maximise the available space for inpatient accommodation and support services within a design that allows for future reconfiguration of inpatient accommodation.

2.1.1.3 In the design & planning of new developments cognisance should be taken of future service needs and the flexibility of layouts and functions should be considered.

2.1.1.4 The overall shape and layout of new hospital buildings, upgrades or refurbishments should optimise staff workflow, patient comfort and safety and allow for optimal delivery of healthcare in consultation with infection control staff.

2.1.1.5 Where possible all new builds and refurbishments should be designed with future developments in mind.

2.1.2 Involvement of infection prevention and control teams and staff

2.1.2.1 HSE Estates and the AMRIC Division of HPSC should agree an IPC liaison at national level to work with Estates in relation to IPC requirements for new builds, infrastructural developments and the refurbishment/upgrades of existing facilities.

2.1.2.2 The local infection prevention and control team/advisors must be involved at all stages of new healthcare developments; particularly brief development, design development, planning, construction planning, equipping and commissioning of the new facility. The local infection prevention and control team/advisors must be represented on the client project team for the new development. Their advice and recommendations should be incorporated into the process.

2.1.2.3 Involvement of infection prevention and control team in the process should be in line with the recommendations detailed in HBN 00-09 (“Infection control in the built environment”) [6].

2.1.2.4 There should be consultation with all grades of staff who will be potential users of the ward/unit early in the brief phase, to ensure adequate space is allocated for all services, including ancillary or support services (such as collection and disposal of healthcare waste). Patients and other potential stakeholders should be included in the consultation process, where relevant.

2.1.2.5 Infection prevention and control requirements must be incorporated in the design and fit-out of all patient care areas in acute hospitals and community residential facilities. This includes inpatient care areas, outpatient departments, day wards, operating theatres, physiotherapy departments, accident and emergency departments, central sterile supplies departments etc. The design of such areas should take account of the relevant UK HTM (or equivalent), where one exists.

2.1.2.6 Prior to Construction Contract Award, the following items need to be considered, specified and incorporated (as appropriate) into any tender specifications and documentation, to form part of the suite of Construction Contract documentation:

The requirement for all works to be carried out in compliance with the 'National Guidelines for the Prevention of Nosocomial Aspergillosis' HPSC Jan 2018

Any and all requirements for aspergillosis protection and enabling works and control parameters need to be reviewed, considered and designed with the Client Stakeholder Group and Project Design team.

- The requirement for work permit system/submission of method statements to be presented for review and comments to the client stakeholder team (including IPC representation), as appropriate, with adequate review periods agreed at the outset
- Any and all testing and monitoring protocols required during construction works, and assignment of responsibility for same, including testing frequencies, intervals, methods and results reviews and actions need to be clearly specified and set out.
- Any and all testing and monitoring protocols required prior to substantial completion, handover and occupancy, and assignment of responsibility for same, including scheduling, testing frequencies and periods, intervals, methods, timelines for results and results reviews and actions need to be clearly specified and set out.

2.1.3 Carrying out the works

2.1.3.1 Appropriate safeguards must be put in place to minimise the risk of transmission of Infection during the construction period, with particular reference prevention of aspergillus and legionella transmission, in accordance with relevant national guidelines [7].

2.1.3.2 When working in or around "live" healthcare facilities, or where construction work may impact on the provision of services a Work Permit system/Method Statement must be in place and adhered to by all parties. Prior to any works commencing the works (and the time period for same) must be signed off by the appropriate parties (which may include local Infection Prevention and Control professionals). The contractors (and or sub-contractors) must abide by the terms of the Work Permit. The work practices must be adequately supervised and be compliant with the local Infection Prevention and Control requirements.

2.1.3.3 Technical details of submissions for building services, systems, finishes, infrastructure, plant, iron mongery, Group 1 items, etc. should be presented for review and comment to the IPC stakeholder team, as appropriate, with adequate review periods permitted.

2.1.4 Sign-off of completed projects

2.1.4.1 On completion of all works, and prior to substantial completion certificate being issued, the IPC stakeholder team will be afforded the agreed and allocated time periods, intervals and frequencies for undertaking all appropriate testing and monitoring in accordance with the Contract documentation. The Contract timeline will account for these testing timelines (as agreed prior to tender) and should not incur delays to handover timelines.

2.1.4.2 On completion of a project the Design Team (Architect normally) will issue a Certificate of Practical Completion. This certificate will state that the works are substantially complete and are in accordance with the Design and Specifications for the project. The relevant members of the Design Team will also, where necessary, issue a statement of compliance with Planning Permission, Fire Certification and Building Regulations.

2.1.4.3 On receipt of Practical Completion, the local Infection Prevention and Control Team assist the Design Team, HBS Estates and Service Management in snagging, de-snagging and commissioning the facility.

Part 2 – Acute Hospital Settings

2.2. Inpatient accommodation for new hospital builds or major renovations

These recommendations apply to:

- New hospital builds (i.e. where a wholly new acute hospital facility is being constructed).
- Major additions to existing hospitals (i.e. where newly-constructed inpatient accommodation is added on an existing hospital site, such as the addition of a new ward block or wing).
- Major renovations and infrastructural developments to existing hospital in-patient accommodation areas (i.e. where an existing inpatient accommodation area is entirely re-modelled, including an extension to provide significant increase in the footprint of the inpatient accommodation area).

2.2.1 Proportion of single patient rooms

Newly built acute hospital inpatient accommodation should generally comprise entirely or almost entirely of single patient en-suite rooms. Some provision for 2 bed units (although with individual patient toilets and showers) may be considered where appropriate to meet the overall care needs of some people [7].

2.2.2 Single patient room design

All single patient rooms should have "en-suite" shower and toilet facilities.

All single patient rooms should have a clearly visible clinical hand wash sink (HBN 00 - 09), in close proximity to the entrance to the room (in addition to a sink for patient use, included as part of the "en-suite" facilities). The "en-suite" facilities should be for the sole use of the person occupying the room.

The design and space requirements of single patient rooms should follow the specifications outlined in UK HBN 04-01 "Adult In-patient Accommodation" Supplement, or equivalent international guidance document.

Single patient rooms in critical care areas (e.g. intensive care units) should have a minimum floor area of 26m^2 (not including "en-suite" sanitary facilities, if such facilities are present) [HBN 04-01].

Single patient rooms should be designed in a way that maximises visibility of patients by healthcare staff, while allowing for patient privacy. In the case of hospital facilities for children the design should take account of the need to accommodate a parent or guardian in the room to accompany the child.

2.2.3 Proportion of airborne isolation rooms

Newly built general acute hospitals should have a minimum of one airborne isolation room for every 150 acute inpatient beds [1].

Newly built regional and tertiary hospitals should have a minimum of one airborne isolation room for every 75 acute inpatient beds [1].

Airborne isolations rooms should be provided within both critical and non-critical care areas including emergency departments.

Newly built accident and emergency departments and critical care units should include at least one airborne isolation room.

Some hospital units will require a higher proportion of isolation rooms with controlled ventilation, based on local risk assessment. These decisions should be made in

consultation with the Infection Prevention and Control team in the hospital. Such units could include:

- Those likely to accommodate large numbers of patients with infections transmissible by the airborne route, such as infectious disease units or respiratory units.
- Those likely to house large numbers of patients with profound immunosuppression, requiring protective isolation, such as solid organ or bone marrow transplantation units.

2.2.4 Airborne isolation room design

Airborne isolation rooms **should not** be based on a "switchable" negative/ positive pressure design. HBN 04 Supplement 1.

Airborne isolation rooms require a dedicated ante room, which should have a minimum floor area of $4m^2$.

In the design of new acute inpatient accommodation, consideration should be given to including one or more single patient rooms with "en-suite" sanitary facilities and dedicated anterooms in each ward, which could be readily converted to airborne isolation rooms, if required. This is in addition to the requirements of 2.2.1 above

2.2.5 Multiple patient room design

Where rooms accommodating more than 2 beds must be accepted in a plan for major renovation they should not contain any more than 4 beds per room (HBN 00-09).

Multiple-bedded rooms should be designed in a way that maximises the potential for future reconfiguration of such rooms.

All multiple-bedded rooms should ideally include individual toilet and shower facilities for each person and at a minimum must include toilet and shower facilities for the sole use of the people occupying the room.

There should be a minimum floor space of $19m^2$ (3,600mm x 3,700mm, including the space for the bed), to allow for clinical activity and potential future reconfiguration of rooms.

2.2.6 Ward/unit layout

Design of wards/units that include in-patient accommodation should take account of recommendations set out in UK HBN-04, or equivalent international guidance document.

Wards/units should be designed so that the flow of goods, services and waste materials is such that cross-contamination between contaminated and clean items is minimised.

2.2.7 Ward/unit fixtures and fittings

Furniture, surface finishes and other fixtures and fittings within any ward/unit that includes in-patient accommodation should be easily cleaned and disinfected, and designed to minimise the risk of transmission of infection, in line with the recommendations in UK HFN 30, or equivalent international guidance document.
[Note see qualification below related to family rooms]

Advice should be sought, early in the design phase, on selection of furniture, surface finishes and other fixtures and fittings from the infection prevention and control team.

Hand hygiene facilities in patient care areas should follow the recommendations included in Guidelines for Hand Hygiene in Irish Healthcare Settings (SARI, 2015).

2.3 Re-modelling of in-patient accommodation in existing acute hospitals

These recommendations apply to internal renovations or re-modelling of existing in-patient accommodation areas. Such renovations may involve major internal construction work, including re-modelling which may include removal of external walls to ensure compliance with infection control requirements.

2.3.1 Infection prevention and control and hospital refurbishment

The recommendations outlined in Recommendation 2.1 apply to all renovation, re-modelling or refurbishment projects in existing acute hospitals.

Any such project in existing acute hospitals should be seen as an opportunity to improve infection prevention and control infrastructure.

2.3.2 Hospital development plans

Acute hospitals should produce a development control plan/spatial strategy, in consultation with the local infection prevention and control team, to examine ways of maximising the proportion of single rooms (with "*en-suite*" facilities) and minimising the proportion of multiple-bedded rooms and the number of beds in each multiple-bedded room. The plan should take account of current and future bed capacity and bed usage, in line with HSE regional and national policy. The plan should prioritise delivery of improved infection control- related infrastructure within as brief a time period as possible. The goals of ensuring that all multiple-bedded rooms have a toilet and shower dedicated for use of people in that room and that multiple-bedded rooms with more than 4 beds are eliminated merits high priority in any such plan.

2.3.3 Internal reconfiguration

If an extension to the existing hospital footprint, or construction of new hospitals buildings, is not planned within 10 years, hospitals should aim to convert existing in-patient accommodation in line with the recommendations outlined in this document.

Where the recommendations in section 2 are not achievable within the existing hospital footprint, hospitals should reconfigure existing inpatient accommodation to achieve a mixture of single and multiple-bedded rooms with avoidance of rooms with more than 4 beds to the greatest extent possible.

Part 3 – Community Healthcare Settings

2.4 Inpatient accommodation for new builds or major renovations in community healthcare settings

These recommendations are similar to those outlined in Recommendation 2.1 above.
These recommendations apply to:

- New Residential Care Centres (i.e. where a wholly new hospital facility is being constructed).
- Major additions to existing Residential Care Centres facilities (i.e. where newly constructed inpatient accommodation is added on an existing site, such as the addition of a new ward block or wing).
- Major renovations to existing in-patient accommodation areas (i.e. where an existing inpatient accommodation area is entirely remodelled, including an extension to provide significant increase in the footprint of the in-patient accommodation area).

2.4.1 Proportion of single patient rooms

All newly built in-patient accommodation in long-term healthcare facilities should be made up entirely of single patient rooms. This relates to patient preference and as the facility may be the person's home for the foreseeable future.

2.4.2 Single patient room design

- All single patient rooms should have "*en-suite*" shower and toilet facilities.
- All single patient rooms should have a clinical hand wash sink, in close proximity to the entrance to the room (in addition to a sink for patient use, included as part of the *en-suite* facilities). The e*n-suite* facilities should be for the sole use of the patient occupying the room.
- Single patient rooms, including en-suite sanitary facilities, should have a floor area of at least 26 m^2.
- Single patient rooms should have adequate seating space for family and other visitors that does not interfere with clinical care of the patient.

2.4.3 Multiple patient room design

- If multiple-bedded rooms are necessary that should not contain any more than **four** beds per room.
- Multiple-bedded rooms should be designed in a way that maximises the potential for future reconfiguration of such rooms.
- All multiple-bedded rooms must, at a minimum, include shower and toilet facilities for the sole use of the patients occupying the room.
- There should be a minimum clear bed space of 19m^2 (3,600mm x 3,700mm, including the space for the bed) to allow for clinical activity and potential future reconfiguration of rooms (HBN-003)

2.4.4 Ward/unit layout

Wards/units should be designed so that the flow of goods, services and waste materials is such that cross-contamination between contaminated and clean items is minimised.

2.4.5 Ward/unit fixtures and fittings

Furniture, surface finishes and other fixtures and fittings within any ward/unit that includes inpatient accommodation should be easily cleaned and disinfected, and designed to minimise the risk of transmission of infection, in line with the

recommendations in UK HBN 30, or equivalent international guidance document. [Note see qualification below related to family rooms]

- Advice should be sought, early in the design phase, on selection of furniture surface finishes and other fixtures and fittings from the infection prevention and control team.

- Hand hygiene facilities in patient care areas should follow the recommendations included in Guidelines for Hand Hygiene in Irish Healthcare Settings (SARI 2015)

2.5 Healthcare Centres and other outpatient-type facilities in the community

2.5.1 Clinic/Unit rooms

- Healthcare is provided in various settings within the community including health centres, primary care centres and clinic rooms within buildings. The general principles outlined above apply and local infection prevention and control staff should be consulted at all stages including design of new builds, upgrading or refurbishment of existing facilities and procurement of equipment for use in these facilities (HBN 00-09)

- Clinic space should be designed to minimize cross-contamination between contaminated and clean items.

2.5.2 Fixtures and fittings

- Furniture, surface finishes and other fixtures and fittings within any clinic room/unit where clinical care is delivered should be easily cleaned and disinfected, and designed to minimise the risk of transmission of infection.

- Advice should be sought, early in the design phase, on selection of furniture, surface finishes and other fixtures and fittings from the infection prevention and control team.

- Hand hygiene facilities in patient care areas should follow the recommendations included in Guidelines for Hand Hygiene in Irish Healthcare Settings (SARI, 2015).

Part 4 Other Settings

2.6 Settings including where end of life care is provided

Hospitals and other settings may have additional non-clinical facilities dedicated for the dignity and comfort of families under special circumstances. These facilities include family rooms and kitchenettes where clinical care does not occur but may be located close to acute clinical care areas. These facilities should be provided with a dedicated toilet with hand hygiene facilities. The furniture and fittings of these rooms may include soft furnishings for comfort but should be selected with a view to ensure that components such as cushions can be detached to facilitate cleaning and that surfaces are cleanable (for example vinyl). Any type of blinds and skirting boards that are easy to clean are acceptable.

3.0 GOVERNANCE AND APPROVAL

- AMRIC Implementation Team.
- HBS Estates.
- AMRIC Oversight Group.

4.0 COMMUNICATION AND DISSEMINATION

- This guideline is circulated through the Acute Operations Office to all Hospital CEOs and General Managers, Community Operations to all Chief Officers.
- This guideline is circulated through Estates to all Regional Estates Leads.
- This guideline is also available on line www.hse.ie/infectioncontrol.

5.0 IMPLEMENTATION

Implementation of this guideline is the responsibility of all hospital managers, Chief Officers and Regional and local Estates Leads.

6.0 MONITORING, AUDIT AND EVALUATION

The learning from this guideline should be shared with relevant professionals at team meetings.

7.0 REVISION/UPDATE

The AMRIC Implementation Team, Estates and CAG will review this guideline every two years.

8.0 References

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6. Health Facilities Notice 30: Infection control in the built environment. NHS Estates, 2003.
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9. Health Building Note 04-01: Adult Inpatient Accommodation DH 2013.

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