POLICY FOR THE MANAGEMENT OF PATIENTS WITH METICILLIN-RESISTANT STAPHYLOCOCCUS AUREUS (MRSA)

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**Purpose**
To outline how the Trust will manage patients who have been found to carry MRSA in order to:

- Prevent cross infection of MRSA between patients
- Prevent the patient developing infection if colonised with MRSA
- Meet Department of Health targets (zero tolerance of MRSA blood stream infection).

**Responsibilities**
Managers are responsible for ensuring that staff are aware of procedures needed to reduce exposure to MRSA.

All staff are responsible for following correct procedures.

The Infection Prevention and Control Team (IPCT) is responsible for providing appropriate advice and training to healthcare workers concerning management of MRSA. All nurses, doctors and other front line healthcare workers in their induction mandatory training are provided with training on infection prevention and control including MRSA swabbing and where relevant decolonisation.

The Occupational Health Team is responsible for the management of healthcare workers colonised with MRSA.

The Microbiology Department is responsible for:

- Ensuring that isolates of MRSA from clinical specimens (e.g. wound swabs or sputum samples) have appropriate antibiotic susceptibility testing.
- Ensuring that alerts are put on the hospital computer high-risk program marking these patients as MRSA positive.
- Ensuring that isolates from patients known to be colonised with MRSA have repeat mupirocin testing, if clearance by topical mupirocin has failed.
- Informing the Infection Prevention and Control Team of all MRSA isolates.

1. **Policy for Management of MRSA Positive Patients**

Management of patients with MRSA can be broken into five areas detailed below: screening, source isolation, patient movement, treatment and clearance.

1.1 **Screening and Identification of MRSA carriage**

Screening for MRSA should be carried out as described in the ‘MRSA and MSSA Screening Policy’.

Wherever possible results should be available prior to inpatient admission. In particular, a result should be known at the point that a patient is sent for surgery or invasive intervention such as central vascular access device (CVAD) insertion.

If there is no result available, the patient must be risk assessed for likelihood of MRSA carriage, and appropriate MRSA antimicrobial prophylaxis must be considered.
1.1.1 Communication with Patients and their Families

Any patient who has a positive test must have the result explained in a caring and effective manner, in private. A careful explanation should be provided of the necessary precautions, isolation and treatment. The appropriate patient information leaflet must be provided and the ward/unit nurse should offer to repeat any of the information once the patient has had time to think about any questions and may ask for a member of the IPCT to talk with the patient.

1.2 Isolation

The proper management and placement of patients with infectious conditions is essential in minimising the impact and potential transmission of any infectious condition including MRSA.

All inpatients who are identified as being MRSA positive must be placed in source isolation under contact precautions. Contact precautions equates to hand hygiene, personal protective equipment (apron and gloves for direct contact), door kept shut, equipment decontaminated before it leaves the room and cleaning with chlorine daily, and on discharge an infected discharge clean.

If single room source isolation is not possible due to a lack of facilities or the patient’s condition, alternative patient management must be discussed with the IPCT.

En-suite toilet facilities are preferable. If not, a commode should be used. This should be removed and cleaned between uses.

If en-suite facilities are not available a shower or bath can be taken in the communal facility and the bathroom should be cleaned with 1000ppm chlorine afterwards.

Plastic aprons and gloves should be available outside the room. Further supplies will be needed inside the room to enable appropriate care.

Once the patient has been moved into isolation any previous bed space must be cleaned with a chlorine disinfectant and the curtains changed. On completion of cleaning the bed may be reused immediately.

Staff must comply with hand hygiene and appropriate use of gloves and aprons. This includes changing gloves and cleaning hands appropriately while in the room to comply with ‘five moments for hand hygiene’.

Soap and water or alcohol hand gel may be used for hand decontamination.

Remove gloves and apron before leaving the patient’s room and decontaminate hands inside room.

Decontaminate hands again after exiting the room using alcohol hand rub.

Use single use equipment wherever possible.

Shared equipment should be decontaminated before use for another patient. Where possible equipment should be cleaned with 1000ppm chlorine. Alternatively a microfiber cloth or a wet wipe may be used for equipment that cannot withstand chlorine.
On discharge, the room should have an infected discharge clean (see Cleaning of Environment Policy).

a) Room stripped of all consumable equipment.
b) Curtains removed and sent to laundry or disposable removed.
c) Room and furniture cleaned with Chlorine 1000ppm.
d) Orange clinical waste bag securely sealed before removal.
e) Linen should be placed into red infected alginate and polythene bags (see Laundry Policy).
f) Curtains replaced, room checked by nurse in charge before next patient admitted.
g) Room should be decontaminated with hydrogen peroxide vapour if possible.

1.3 Patient Movement

1.3.1 Within the Ward

Patients placed in source isolation should remain within their room, with the door closed to minimise spread to adjacent areas.

If this is likely to compromise patient care, for instance in an elderly confused patient; a risk assessment should be made in conjunction with the Infection Prevention and Control Team, as to whether the door may be kept open.

The side-room door must be kept closed during procedures that may generate staphylococcal aerosols, such as chest physiotherapy, or bed making.

Any patient movement (outside the isolation room) other than to diagnostic/therapeutic departments should be in consultation with the IPCT.

MRSA is not a reason to stop a patient's rehabilitation; however consideration must be given to using quiet or non-populated areas wherever possible.

A receiving department MUST be notified in advance if the patient has MRSA, so staff can make the necessary preparations.

1.3.2 Transfer to another Ward (Intra-Hospital Transfer)

Before transfer of a patient from one ward to another it is recommended that the patient should have a wash and put on clean clothing.

Any wounds should be covered with an appropriate dressing.

The patient should be transferred to a clean bed with clean linen.

The patient's original bed and linen should be left on the ward and treated as infected.

1.3.3 Portering

Porters pushing a wheelchair DO NOT need to wear apron and gloves.

If physical contact with the patient is anticipated, porters should wear non-sterile gloves and disposable plastic aprons.
Aprons and gloves should be removed when contact with the patient is complete and disposed of as clinical waste.

After dealing with the patient and cleaning the trolley or chair, staff should decontaminate their hands.

The trolley or chair should be cleaned with Detergent Wipes after use by the patient and before being used for another patient.

All linen should be dealt with according to Trust Policy for the Management of Linen.

1.3.4 Surgical Operations and Other Invasive Procedures

A recent MRSA screen should be available on the day of surgery to confirm the current MRSA status. If up to date results are not available, swabs should be taken prior to the start of the procedure.

Where possible an attempt should be made to decolonise a patient found to be carrying MRSA or MSSA, before they present for surgery, CVAD or other device insertion.

Patients found to be colonised with MRSA or MSSA should be given a 5 day eradication protocol which includes:

- pre-operative wash with Chlorhexidine 4% in detergent which should remain in contact with the skin for one minute before being rinsed off; and
- mupirocin nasal ointment three times a day.

Rescreening should be carried out a minimum of 48 hours after the end of the protocol.

Where possible it is desirable to obtain three negatives screens prior to surgery, however this must be balanced with the clinical need for the procedure. Advice is available from the Consultant Microbiologist or Infection Prevention and Control nurses.

The patient must have a pre-operative wash with chlorhexidine on the day of the procedure regardless of any negative samples.

Antibiotic prophylaxis should be given as directed by the Consultant Microbiologist.

Antiseptic skin preparation for insertion of peripheral or central vascular access devices should always be undertaken with 2% Chlorhexidine in 70% alcohol as the skin preparation of choice. If the patient is allergic to chlorhexidine then consider alcoholic povidone iodine.

Theatre must be informed for scheduling purposes that a patient has MRSA, in order that they can make suitable preparations.

If a positive result has not been actioned prior to the procedure the patient should have either a chlorhexidine shower or a bed bath with (the Pink) Chlorhexidine wash cloths (this can be done in the anaesthetic room if necessary).
Patients colonised with MRSA should be recovered after surgery in the operating theatre or an area not occupied by other patients to avoid possible contamination of the usual recovery area.

Theatre surfaces in close contact or near the patient, such as the operating table or instrument trolley, should be disinfected using 0.1% NaDcc (1,000ppm chlorine solution e.g. SoChlor).

The Theatre should not be used for at least half an hour after the end of the case to facilitate thorough cleaning and air changes.

Patients with skin conditions such as psoriasis are at higher risk for colonisation with unwanted pathogens. If possible they should be screened and offered the daily antiseptic wash and be encouraged to use a good moisturiser to reduce shedding of skin scales.

1.3.5 Inpatient diagnostic and therapeutic visits

Visits by MRSA positive inpatients to other departments should be kept to a minimum. If this is necessary, either for investigation or treatment, prior arrangements should be made with senior staff of the receiving department, so that control of infection measures for that department can be implemented. These should include:

- Dealing with these patients at the end of the working session if possible.
- The patient should spend the minimum time in the department, being sent for when the department is ready, and not left in a waiting area with other patients.
- Staff coming into direct contact with the patient should wear disposable gloves and aprons.
- Equipment and the number of staff attending should be kept to a minimum.
- When finished, the area should have an infected discharge cleaned and any surfaces with which the patient has had direct contact should be cleaned with Chlorine 1000ppm.

It is the responsibility of the referring ward/department to inform the receiving department of the patient’s MRSA status.

1.3.6 Outpatients and Day case

Patients with MRSA are flagged on the EPR and thus can be identified on clinic lists.

Patients seen in day care areas and outpatients should be fully dressed with any wounds covered by an impermeable dressing.

MRSA patients should be cared for in a single room wherever possible. The room should have an infected discharge clean using chlorine 1000ppm when the patient leaves.

Staff coming into direct contact with the patient should wear disposable gloves and aprons.

1.3.7 Discharge of Patients

MRSA patients should be discharged promptly from hospital when their clinical condition allows. Colonisation with MRSA is not in itself an indication to remain in hospital.
If the patient is discharged to another healthcare provider, including nursing or convalescent homes, the medical and nursing staff (at the receiving unit) should be informed in advance by the patient’s clinician or ward nurse. Carriage of MRSA is not a contraindication to the transfer of a patient to a nursing or convalescent home.

It is the responsibility of the clinician caring for the patient to ensure the General Practitioner and other healthcare agencies involved in the patient's care are informed of the patient’s MRSA status and any treatments given, as part of the discharge summary.

If a patient is found to be positive post discharge, a GP letter will be sent by a member of the IPCT. This letter will usually be copied to the patient along with a patient information leaflet.

After discharge, the patient's room or bed area should undergo an infected discharge clean. Where possible the room should be disinfected with hydrogen peroxide vapour before being released for use by another patient. Any equipment that cannot be decontaminated should be disposed of as clinical waste.

The nurse in charge must check that the room is correctly cleaned before admitting another patient to the area.

1.3.8 Transfer to another Hospital / Health Care Facility

Identification of infected or colonised patients is the responsibility of the transferring hospital.

As part of transfer planning an MRSA screen should be obtained in order to provide the receiving unit with up to date results.

Before transfer, the clinical team responsible for the patient must inform the ward and clinical team at the receiving hospital/facility of the patient’s complete MRSA status and treatment.

The transferring ward must also inform the Trust’s IPCT who will notify the receiving Trust’s IPCT. This must be documented in the patient’s medical notes.

1.3.9 Ambulance Transportation

The ambulance service should be notified in advance by the ward staff that the patient is MRSA positive.

Patients using hospital transport should be fully dressed with any wounds covered by an impermeable dressing.

Most MRSA patients may be transported with other non-MRSA positive patients in the same ambulance without any special precautions, other than changing the bedding used by the patient. However, if transport of a potentially heavy disperser is necessary such as a patient with a discharging lesion which cannot be enclosed by an impermeable dressing, or widespread colonised skin lesions, it may be necessary to transport this patient alone.
Ambulance staff should wear a plastic apron and gloves if/when handling the patient and clean their hands with an alcoholic hand rub.

Surfaces in contact with the patient should be wiped down with detergent wipes. No extra cleaning of the ambulance is usually required after transporting.

No special precautions are required by voluntary cars booked through the ambulance service.

1.3.10 Visitors

Family and close friends visiting the patient do not need to wear gloves and aprons. They should be encouraged to clean their hands on entry and exit either by hand washing or use of the alcohol hand rub.

Visitors should check with nursing staff before entering the room.

Babies, young children, and other patients should be discouraged from visiting.

1.4 Treatment of a patient found to be colonised with MRSA

Where possible the patient should be started on decolonisation protocol for MRSA.

Before commencing any decolonisation protocol, a full MRSA screen should be obtained to assess the extent of carriage.

Individual patient assessment should be made to identify barriers to decolonisation. Such barriers may include damaged skin (e.g. psoriasis), presence of invasive devices or non-cooperation.

The standard treatment protocol to decolonise MRSA should be given for five days unless advised by the Infection Prevention and Control Team.

A standard treatment protocol will include a body wash and nasal ointment as a minimum. Chlorhexidine 1% (CX) powder to axillae and groins and Chlorhexidine 0.2% mouthwash if denture wearer or throat positive may also be used.

Where a patient is ‘sputum positive’, a topical protocol may not always be applicable. If the patient is sputum positive contact the Consultant Microbiologist or a member of the IPCT for advice.

Treatment protocols should not be extended or repeated without prior discussion with a member of the Infection Prevention and Control Team.

Where a patient with chronic colonisation has failed repeated attempts at clearance, prescription of a further protocol is often inappropriate. The risk from invasive procedures should be minimised using antiseptic washes and good aseptic technique. Individual cases should be discussed with the IPCT.
1.4.1 Standard Protocol

2% Mupirocin (in white soft paraffin base) nasal ointment. Apply a small amount with a gloved fingertip to the anterior nares, three times daily. Massage the nose to work the cream backwards up the nose (until it can be tasted).

If Mupirocin resistant, or if Mupirocin sensitive, but not eradicated after two courses of treatment, then Prontaderm Cream or 1% Chlorhexidine gluconate cream can be substituted.

4% Chlorhexidine in detergent antiseptic wash should be used for all daily body washing procedures and for bed bathing. The skin should be moistened and the solution applied directly to the skin. The skin should be lathered thoroughly with a disposable patient wipe and the solution should be left on the skin for one minute before rinsing. Special attention should be paid to axillae, groins, perineum, buttocks and under folds of skin. The hair should be washed on days one and three of the protocol, using the antiseptic wash solution.

For patients unable to wash, Chlorhexidine impregnated wipes are available.

If the patient has dry or sensitive skin, seek advice from the IPCT before using an antiseptic wash. Possible alternative products include Octenisan, Stellisept, Dermol 500 or Prontaderm.

Patients with significant skin disease should be referred for Dermatological review for definitive advice on treatment.

Where topical MRSA suppression therapy is deemed inappropriate this must be clearly documented in the patient’s notes by the clinical team.

Chlorhexidine 1% powder can be applied to axilla and groins twice a day.

Chlorhexidine 0.2% mouthwash, if denture wearer or throat positive may also be used as a gargle or mouthwash (10ml) twice a day.

Bed linen and patient’s towels and clothing should be changed daily.

Bar soap must be discarded. Liquid soaps are recommended for use.

Hair brushes/combs must be washed in hot soapy water and dried before and after treatment.

Wet shaving: use disposable razor only, do not use shaving brush or shaving soap. Electric shaving: the razor head must be dismantled and cleaned in accordance with the Trust ‘Decontamination of Medical Devices Policy’.

Small lesions and large raw areas or burns e.g. eczema or superficial pressure sores can be treated daily with 2% Mupirocin skin cream/ointment or 1% Chlorhexidine gluconate cream (according to sensitivities). Do not use Mupirocin in deep wounds where large
quantities of PEG (polyethylene glycol) may be absorbed or in moderate to severe renal impairment.

Infected lesions should be treated systemically, if clinically indicated (advice to be sought from the medical microbiologist).

Plastic in-dwelling devices e.g. IV lines, jejunostomy tubes etc, may be treated using 2% Mupirocin (in white soft paraffin base), nasal ointment or 1% Chlorhexidine gluconate cream (according to sensitivities). NB: Do not disturb an intact covered IV line which has no indication of colonisation or infection. Leave a minimum of 48 hours after completing protocol before re-screening all sites.

1.4.2 Throat colonisation

Throat colonisation may need to be treated systemically in addition to the skin washing protocol for five days only. This should be undertaken only on the advice of the Consultant Microbiologist.

1.4.3 Sputum colonisation

Sputum colonisation can be difficult to treat even with systemic antibiotics. This is particularly so in those with chronic chest conditions. If eradication of MRSA from sputum is indicated, advice should be sought from the Consultant Microbiologist. Topical treatments are largely ineffective in this situation. Each patient should be assessed individually.

1.4.4 Surgical prophylaxis

Patients who require surgery and have a history of MRSA colonisation or infection without documented decontamination of eradication should receive glycopeptides prophylaxis as per Antimicrobial Guidelines.

Patients who are known to be colonised/infected with MRSA and are undergoing invasive procedures involving the insertion of lines or prostheses (e.g. breast implants) should be given teicoplanin prophylaxis, as per the Antimicrobial Guidelines.

The empirical use of glycopeptides for treatment of infection may also be considered if there is an appreciable risk that patients' MRSA carriage may have recurred or they come from facilities with a high prevalence of MRSA.

1.4.5 Patients with a CVAD

Staph aureus carriage is a significant risk factor for blood stream infection in the presence of invasive devices and staff must remain observant for signs of sepsis or exit site infection.

Patients who are found to have MRSA or MSSA should have chlorhexidine impregnated dressings to protect the exit site (Tegaderm CHG). This is particularly important in femoral lines and in critical care.
1.4.6 Paediatric Protocol

The Paediatric Protocol is as above for adults, however babies, especially neonates may have sensitive skin. If Chlorhexidine 4% is contraindicated, especially in the very young, Octenisan, Dermol 500 or Stellisept may be used, this will be prescribed on discussion with the Consultant Microbiologist.

The skin should be moistened and the antiseptic solution applied thoroughly to all parts of the skin before rinsing in the bath or shower. Do NOT dilute in bath water as the concentration is insufficient. A disposable sponge or flannel should be used to apply the antiseptic solution. Special attention should be paid to sites such as axillae, groin, perineum and buttock areas, umbilicus and other skin folds.

1.4.7 Treatment of a patient infected with MRSA

The majority of patients who have acquired MRSA are colonised rather than infected, however occasionally infection does occur with the same morbidity and mortality as MSSA.

Where infection is suspected, advice should be sought from the Consultant Microbiologist.

Treatment guidance is available in the antibiotic guideline, as well as from the Consultant Microbiologist and the Antimicrobial Pharmacist.

1.5 Clearance

1.5.1 Clearance protocol

On completion of all topical and systemic treatment the patient may be re-screened to establish whether eradication has been effective.

Re-screening can only be undertaken when all topical treatments and systemic antibiotics have been stopped for at least 72 hours.

Where a patient has been receiving systemic antibiotics, please contact the Consultant Microbiologist for advice.

A full screen must be completed (Nose, perineum/groin, axilla, throats, and/or wounds, CSU, and any manipulated sites.

If screen result is negative then do a second re-screen.

If screen is still positive consider recommencing treatment protocol (no more than two attempts).

If negative carry out third screen.

Continue source isolation until three full sets of negative screens are obtained.

The original positive site MUST be included in the screening.
Only when negative results from all three sets have been confirmed (and patient is no longer on topical or systemic antimicrobials), may the patient come out of isolation.

If a patient remains positive after treatment, please discuss with the IPCT for further advice.

On any future admission the patient should have a full screen taken to check that they are still negative. The patient should be isolated pending the results.

1.5.2 Establishing Clearance on Previous Positive Patients

For patients who have been positive on a previous admission, there must be copies of three full sets of negative screen results in the notes. These must, if necessary, be faxed from the referring hospital or GP.

Please contact the Infection Prevention and Control Team if the patient’s history needs to be reviewed.

If there is evidence of three sets of screens available, the patient should be isolated on admission, and a full screen obtained to check clearance has been maintained.

If three sets are not available the patient must remain in isolation until three sets of screens have been obtained and are all negative.

Clinical notes will remain flagged as it is not uncommon for the patient to recolonise with MRSA.

2. Management of MRSA positive staff

On receipt of a positive swab result Occupational Health will inform the member of staff.

The member of staff will hand over their patient care/case load as a matter of priority and attend the Occupational Health Department immediately for further assessment.

2.1 Screening of Staff

Staff screening will usually consist of:

- Nose
- Perineum/Groin
- Following assessment, any break in the skin surface including minor/recently healed wounds, eczema or psoriasis. This is particularly relevant for hands and arms.

2.2 Treatment

Treatment will be as administered as for patient management, depending on Mupirocin sensitivity and the extent of colonisation/infection.

The healthcare worker may be asked to refrain from work for the first 48 hours of treatment as directed by Occupational Health.
2.3 Return to Work

If colonised in the nose only the healthcare worker may usually return to patient contact and continue with treatment.

If colonised elsewhere or Mupirocin resistant, advice may be sought from the IPCT who will make a risk assessment based on the swab results and the type of work undertaken. If necessary staff may be redeployed to non-clinical duties at the discretion of their manager.

2.4 Clearance

On completion of all topical and systemic treatment, a period of three full days must elapse before re-screening. Staff must attend Occupational Health for re-screening to establish clearance.

Staff may be asked to have screens performed every six months to establish that clearance is maintained.

2.5 Pregnant Staff

There is no reason that pregnant staff cannot care for patients with MRSA.

3. Surveillance

The Trust participates in the Department of Health (DH) mandatory surveillance of MRSA and Staphylococcus aureus bacteraemias. Data is entered onto the Health Protection Agency’s Healthcare Associated Infection Data Capture System (MESS) by the Director of Infection Prevention and Control (DIPC) in real time for MRSA bacteraemias. The Chief Executive or his deputy signs this off monthly as required by the DH. Data on Staphylococcus aureus bacteraemias (MSSA) is entered quarterly by the DIPC.

All cases of MRSA are monitored by the Infection Prevention and Control Team as part of alert organism surveillance. All isolates are coded to determine likely origin and aid recognition of an outbreak, as well as promoting good management of each case. All cases of MRSA bacteraemia are subject to Post Infection Review (PIR) within five days of the result being known. Findings and action plans of the PIR are communicated to the all key stakeholders.

Case records are maintained by the Infection Prevention and Control Team using EPR.

4. Outbreak

Definition: two or more new cases of patients colonised / infected with MRSA identified within 7 days of each other, who are thought to have acquired MRSA on a particular ward or clinical unit.

The procedure for managing a suspected outbreak will be as outlined in the Outbreak Management Policy for the Trust.

Initially, the IPCT will assess the situation and determine if there is a period of increased incidence (PII) or an outbreak.
If an outbreak or PII is confirmed the IPCT will:

- Work with staff in the department to ensure that correct practices are followed.
- Undertake an audit to ensure that the environment is clean.
- Ensure that full MRSA screens are taken from all patients and contacts in the affected area.
- Inform the DIPC.

If the outbreak is small, an incident control group consisting of the IPCT will manage the outbreak and will keep the DIPC informed. A root cause analysis will be completed and information fed back at the Hospital Infection Prevention and Control Committee. Appropriate feedback and recommendations for action will be fed back to staff in the affected area.

If there is a large outbreak, the DIPC will follow the outbreak plan and call an appropriate Outbreak Control Group (OCG) to plan a strategy for the management of outbreak.

Decisions that may need to be taken by the OCG include:

- The need to close the ward to admissions and transfers
- Changes to antibiotic and clinical policies
- Nursing of affected and non-affected patients, e.g. cohort nursing
- Timetable for cleaning and re-opening of ward
- Investigation of the epidemiology of the outbreak e.g. MRSA typing, environmental screening etc.
- Management of affected healthcare workers and deployment of staff.

5. Linked documents

- MRSA and MSSA Screening Policy
- Laundry Policy
- Cleaning of Environment Policy
- Transfer of Patients Policy
- Waste Management Policy
- Outbreak Management Policy
- Infection Prevention and Control Operational Policy
- Management of Patients with Infection Policy
- Hand Hygiene Policy
6. References


Advisory Committee on Antimicrobial Resistance and Healthcare Associated Infection (ARHAI). National one week (NOW) prevalence audit of MRSA screening report (ARHAI 22-13(02)). Available at: https://www.gov.uk/government/policy-advisory-groups/advisory-committee-on-antimicrobial-resistance-and-healthcare-associated-infection#minutes (Accessed 16.05.17)


Appendix 1

MRSA Prescribing Flowchart

1. Please follow the flow chart as compiled by Pharmacy, and prescribe the green boxes.
2. This is a summary; please consult the 'MRSA Positive Patients - Policy for the Management of' for more complete advice.
3. Seek advice from the Microbiologist for systemic treatment or infected lesions.
4. If patient is Mupirocin sensitive but MRSA is not eradicated after two courses of treatment, use Mupirocin resistant Protocol.
5. Re-screen all sites at least 48 hours after completing protocol.
Appendix 2

Screening of meticillin-resistant *Staphylococcus aureus* (MRSA)

(Refer to policy for full details)

A **minimum routine screen** is nose and groin/perineal. **Other relevant** samples to be taken include: wounds, manipulated sites such as urinary catheters or IV devices, sputum sample if productive, urine sample if catheter in situ

<table>
<thead>
<tr>
<th>Patient groups to be screened</th>
<th>Notes</th>
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<tbody>
<tr>
<td>New patients to RM who have lived overseas in the last year</td>
<td>Except outpatients attending for a single visit where no further care is planned.</td>
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<tr>
<td>New haemato-oncology patients</td>
<td>On their first visit.</td>
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<tr>
<td>All inpatient admissions and intra-hospital transfers</td>
<td>Screen inpatient <strong>within 24 hours</strong> (except where the patient has already had a pre-operative screen in the last 6 weeks)</td>
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<tr>
<td>All preoperative surgical patients due for surgery, CVAD or IR</td>
<td>Pre-operative screen should be done up to 6 weeks before the planned operation date. Result should be available at time of surgery. Screening for a biopsy is desirable only if it can be facilitated Commence all surgical/CVAD patients on ‘universal decolonisation’.</td>
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<tr>
<td>Critical Care Unit (CCU) admissions and Haemato-oncology inpatients (adult and paediatric)</td>
<td>Full screen should be taken <strong>within 24 hours of admission</strong> (unless they already had a screen within the previous week or are on universal decolonisation protocol) <strong>AND</strong> Weekly full screen</td>
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<tr>
<td>Patients who are receiving systemic anti-cancer therapy (SACT)</td>
<td>At the start of their first cycle and at the end of the last cycle.</td>
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<tr>
<td>Long stay inpatients who have been in the Trust for longer than 28 days</td>
<td>Monthly screen</td>
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<tr>
<td>Patients in the same bay as an MRSA positive patient ‘contacts’</td>
<td>Screen <strong>after</strong> positive patient has been moved</td>
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<tr>
<td>Patients who have finished an eradication protocol</td>
<td>Re-screen to assess effectiveness of treatment. Ensure previous positive sites are included. Screen a minimum of 48 hours after the protocol has stopped</td>
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<tr>
<td>History of previous MRSA</td>
<td>Screen on admission and source isolate pending results Ensure known previous positive sites are included in screening.</td>
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</tbody>
</table>

Three consecutive full sets of negative screening specimens are required before a patient is regarded as “cleared” of MRSA colonisation. These should be taken a minimum of 48 hours after treatment is finished, and preferably separated by a week or more.

Even though a patient may be cleared, there is still a possibility of them recolonising with MRSA, especially if admitted to hospital or given antibiotics. Any patient who was previously positive for MRSA (even with 3 negative screens), should be isolated and rescreened on any new admission to hospital to check they remain negative. If one set is negative they can usually be de-isolated.

Infection Prevention and Control team April 2017

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