THE STATE HOSPITALS BOARD FOR SCOTLAND

Infection Control Annual Report

1 April 2022 – 31 March 2023

Reference Number	Item XX	
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Approval Group	Infection Control Committee	

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1. Core Purpose of Committee

The State Hospitals Board is responsible for infection prevention and control (IPC) within its services, ensuring that the risk of healthcare associated infections to patients, staff, carers, volunteers, and visitors is minimised. The employment of evidence-based protocols will assist clinical practice to ensure a clean and safe environment is an integral part of our overall clinical governance agenda. The State Hospital is a high risk environment with predominately low risk patients. In the event of an outbreak regardless of the virus the attack rate is viewed to be significant given the 'closed' environment.

The Infection Control Department promotes the highest standards of practice within the organisation for infection prevention and control, ensuring compliance with the Healthcare Improvement Scotland (HIS) Infection Prevention and Control Standards (2022). The ICC supports the development, implementation, and ongoing monitoring of infection control activity throughout the State Hospital in line with the Infection Control Programme of Work.

2. Current Resource Commitment

There is one Senior Nurse for Infection Control (SNIC) to oversee all aspects of infection control within The State Hospital.

There is one Clinical Quality Improvement Facilitator (CQIF) for Infection Control to oversee the Quality Improvement (QI) agenda for infection control.

The SNIC and CQIF are the Infection Control Team.

3. Summary of Core Activity for the last 12 months

Antimicrobial Management

Inappropriate use of antibiotic medication can have a negative impact on individual levels of resistance and vulnerability.

The State Hospital continues with its Service Level Agreement with NHS Lanarkshire for the provision of sessional input from an Antimicrobial Pharmacist (who is also a member of the State Hospital Infection Control Committee). This contract has been extended to 31st March 2026.

The NHS Lanarkshire Empirical First Line Antibiotic Policy for Primary Care has been adopted for use by the State Hospital. The Infection Control Committee monitors the results of the audits led by the Antimicrobial Pharmacist in conjunction with members of the Clinical Quality Department. This will be audited in the incoming year.

The State Hospital is represented in the Lanarkshire Antimicrobial Management Committee by our Antimicrobial Pharmacist.

Currently the Hospital is compliant with all National / Local Antimicrobial Prescribing Policy and Guidance, with a sustained minimal spend on such drugs.

Antimicrobial spend for year is £1061.00

DATIX Incidents

The State Hospital uses the DATIX reporting system to monitor and examine infection control incidents; this will highlight concerns and emerging trends.

Table 1, shows the Infection Control Incidents for the reporting period of the last 12 months.

Table 1 Infection Control Incidents – 01/04/2022 to 31/03/2023

Type	Number (20/21)	Percentage of Total (20/21)	Number (21/22)	Percentage of Total (21/22)	Number (22/23)	Percentage of total (22/23)
Clinical Waste	40	72.7%	35	57.4%	50	60.2%
Exposure to Bodily Fluids	2	3.6%	3	4.9%	1	1.2%
Needle stick	0	0%	0	0.0%	0	0%
Outbreak Excluding COVID	1	1.8%	0	0.0%	0	0%
Patient Suspected Contagious Illness	9	16.4%	19	31.1%	25	30.1%
Staff Suspected Contagious Illness	1	1.8%	2	3.3%	7	8.4%
Other	2	3.6%	2	3.3%	0	0%
Total	55	100%	61	100%	83	100%

Over the last 12 months the number of DATIX submitted has increased from 61 in 2021/22 to 83 in 2021/22. The two main reasons for this is due to the number of patients who have tested positive for Covid and also the number of Clinical Waste DATIX's being reported. It should be noted that not all Covid cases are reported through DATIX. The Infection Control Team are working with the Risk Department to review DATIX.

The number Clinical Waste DATIX have increase and these related to issues relating to not disposing of Laundry specifically 'Used Linen' (Sleep knit / Towels) and 'Known or Suspected infection /soiled items' as indicated in the safe management of linen policy.

Although the number has increased this should be viewed positively. Following support (from the CQIF) to laundry department, this service has increased their reporting which demonstrates a more accurate reflection of the situation. This supportive measure has provided the laundry staff with the confidence to report incidents in a more comprehensive manner.

Monthly Infection Control Reports are produced and circulated to all Senior Charge Nurses. Within these reports there is a specific section which details incidents that have been reported through DATIX in relation to infection control. Senior Charge Nurses are required to

complete an action plan on how they will reduce the number of incidents, which in turn is presented to the Infection Prevention and Control Group and escalated to the ICC if required.

Autumn / Winter Vaccination Programme

The State Hospital offered staff the opportunity to receive their Covid19 & Flu vaccination onsite. A small cohort of peer vaccinators delivered this on an appointment basis. Approximately 300 vaccinations were administered; however, this could be a combination of Covid19 and/or Flu.

Externally staff were able to access both the seasonal flu vaccine and the Covid19 booster at one of the mass vaccination centres at a time that was convenient to them. There was no requirement for staff to advise us if they had received their vaccinations as this is deemed as health data.

The percentage of vaccinations among patients has decreased from 74.4% to 59.7%, with 37 patients declining (31%) and 11 patients not offered (9.3%).

32 patients fall into the additional “at risk” group, of this 24 patients (75%) consented to flu vaccination.

There were 2 patients over 65, both consented to flu vaccine (100%). The under 65 group in the “at risk” population was 30 patients, of which 22 consented to flu vac (73.3%).

Review / Development of Policies and Guidance

The State Hospital Board continues to use the NHS National Infection Control Manual supplemented by its own electronic infection control policies and guidance which manages local issues. Policies are influenced by those developed and approved by NHS Lanarkshire Infection Control Committee (which the SNIC attends) and emerging information received from Health Protection Scotland. The Vale of Leven report recommends all infection control policies are reviewed biennially or earlier if legislation / emerging guidance dictate.

An overarching Equality Impact Assessment (EQIA) & Data Protection Impact Assessment (DPIA) for the suite of infection control policies was developed and these were reviewed in August 2022 and as policies renew. All infection control policies are in the process of being reviewed with a view to converting some to Standard Operating Procedures.

COVID19 Activity

The Infection Control Team has subsumed the role of the Covid19 support team since April 2022. The last 12months have been challenging due to Covid19, with three significant peaks in June/July 2022, December 2022 and March 2023.

There have been 152 positive Covid Cases since March 2020.

- 94 positive Covid cases since 1st April 2022 - 31st March 2023
- 9 positive Influenza A cases during 25th December – 2nd January 2023

In July 2022 we moved to a more ‘least restrictive model of care’. This enables those patients who are asymptomatic with a negative LFD test to continue with the normal daily activities.

By testing symptomatic cases, it is inevitable that asymptomatic cases are identified and therefore it can be difficult to identify the initial patient case.
In September 2022, Scottish Government paused asymptomatic LFD testing for staff.
The State Hospital continues to require all employees to wear fluid resistant surgical facemasks:

- when in clinical areas
- when in areas where patients might be present
- when unable to maintain 2m distancing from colleagues (including non-clinical areas)
- When moving around (including non-clinical areas)

This is contrary to the national guidance whereby it is only strongly recommended. However as the hospital is a small organisation with a closed population, this was deemed an appropriate decision based on protecting patients and service resilience.

Face Fit Testing

The State Hospital had undertaken a Face Fit testing program from April 2020 which enables staff to undertake AGPs safely. Primarily these activities are CPR (specifically airway management as part of the CPR continuum) and some dental procedures. Staff would also be required to wear FFP3 masks if they are in the presence of an AGP. In May 2022 an additional six members of staff were trained to become Face Fit Testers. It was agreed by the ICC that these would be non-clinical staff as from previous experience it is difficult to release clinical staff from their duties in order to complete this role.

Table 2, shows that there are currently 89% of the eligible staff currently face fit tested. This is about the aim of 85% of all clinical ward based staff will Face Fit Testing to ensure that there is sufficient clinical staff available on each shift to support Duty Resus duties.

Table 2

	Face fit tested	Refit required (due to discontinued mask)	Face fit testing to be completed	Staff exempt
2022	327 (87%)	9 (2%)	36 (10%)	4 (1%)
2023	338 (89%)	9 (2%)	32 (8%)	4 (1%)

4. Comparison with Last Year's Planned QA/QI Activity

The table 3, below indicates progress made against the future areas of work for 2022/23.

Table 3

Recommendation	Timescale	Progress
To consider innovative ways to increase compliance with infection control training	Delayed to December 2023	1. REHIS Elementary food hygiene is delivered online with written exam taken onsite. 2. Infection Control Team have been involved in 1 nursing induction which has been face to face. It is hoped that IC induction will form part of the corporate induction (IPC (2022) standard 2)
To monitor DATIX with	On-going	The number of DATIX reported increased

specific attention being place on items being coded as clinical waste		surrounding laundry since last year; however this is most likely due to the change in DATIX coding, education and generally a more robust reporting system. This is continues to be monitored/investigated by the Infection Control Team, Risk Management Team and Housekeeping and Linen Manager
Introduction Hand Hygiene Peer audits	June 2023	Action from last year was reviewed and it was deemed more appropriate to have wider IC audits undertaken by members of the IPCG.
Review of all Cleaning Schedules and commencement of audits	Partially completed	This QI project took longer than anticipated; however it has been implemented in a non-clinical area and is rolling out to the Skye Centre during April and then wards

5. Performance against Key Performance Indicators

There are no formal organisational Key Performance targets for Infection Control.

The Infection Control Team in conjunction with the Infection Control Committee have agreed local indicators for Face Fit Testing and Hand Hygiene.

6. Quality Assurance Activity

Audit

Clinical audit is a proven method of quality improvement. It gives staff a systematic way of reviewing their practice and making improvements in patient care using quality improvement methodology. Our audit results demonstrate sustained improvement in practice and motivate staff and patients to maintain this improvement. The Infection Control Audit program is based on the Standard Infection Control Precautions and other priorities which are deemed to be a risk to patients.

There have been no unannounced inspections from the Healthcare Environment Inspection Teams or Environmental Health Officer during this period. The last inspection was 2019.

The main activities from the audit programme include:

Clinical Waste / Sharps Audit and Infection Control Environmental Audits

The Infection Control Team are reviewing the process/documentation alongside the Risk Management department to ensure that the audit tools are fit for purpose. The change in Health & Safety providers for the hospital might support a more integrated approach to this aspect of infection control.

Cleaning Services

As per HDL(2001)10 and HDL (2005)8, infection control manager is designated as having overall responsibility for management processes and risk assessment relating to infection control (including the issue of antibiotic resistant infections and antimicrobial prescribing), medical devices decontamination, medical devices management, and cleaning services.

The Infection Control Team and the Housekeeping and Linen service manager are reviewing the risk assessments, cleaning schedules and recording documentation for the entire site. A quality improvement project commenced in a non-clinical area (i.e. the Management Centre) with successful outcomes. This is currently being trialled in two clinical areas within the Skye Centre. It is anticipated that the project will be completed by within the calendar year.
The housekeeping department continue to undertake the NHSScotland National Cleaning Services Specification (2021) monitoring, which provides the assurance that every room (as a minimum requirement) is audited not only for cleanliness but also estates and user issues on an annual basis. The audit results are submitted to Health Facilities Scotland monthly and the Infection Control Committee quarterly. The quarterly audits results have continued to be in the 'green', which indicates a result of 90% or above. These audit scores are the consistent with last year. Senior Charge Nurses provide supplementary assurance through the eControl book quarterly audits.

Estates issues

There remains outstanding actions pertaining to the Skye Centre (PLC & Sports and Fitness) & Islay relate. The Estates department are aware of the issues. The significant water leaks and subsequent water damage caused by heavy rain was a result of latent defects. Attempts to rectify the defects in the PLC have been made however, the problem of water leaks is still present. There is some outstanding remedial damage to paintwork etc that requires attention. The Infection Control Committee continues to monitor the situation on a quarterly basis.

HAI SCRIBE documentation continues to used for any new or remedial structural or maintenance actions that are identified within the hospital. There has been 1 occasion (MSR alterations) when this has been required during this review period.

Bed Mattress Audit

It is known that damaged mattresses can harbour micro-organisms and be a potential cause of cross-infection. The SNIC continues to undertake an annual quality assurance audit of all mattresses across the hospital.

The bed mattress audit is undertaken to ensure compliance with national guidance from the Medicines and Healthcare Products Regulatory Agency (MHRA) relating to all types of bed mattresses (MDA/2010/002). The condition of patient mattresses is also a key area of inspection by the HEI team.

There is a guidance document that outlines the procedure for both housekeeping and nursing staff; to ensure that the bedroom is fit to receive new patients. This is working well with no complaints received from patients, housekeeping, ward staff or SNIC. Bed mattress audits are included in the IC program of work.

Blood Borne Virus (BBV) Audits

<u>BBV Admission Assessment</u>
When a patient is admitted to The State Hospital, a BBV Admission Risk Assessment should be completed on the day of admission. The information is obtained either directly from the patient or from past notes.

From 1 August 2021 to 31 July 2022, 28 patients were admitted; 21 were still inpatients at the time of the audit. The data for this audit was obtained from the BBV assessment data stored in the patient's record on RiO.

Table 4, shows data over the last 6 years of the number of patients who are resistant at the State Hospital. The total number of admission BBV risk assessment completed fore 2021/22 was 95%, therefore there has been a 1.9% decreased on 2020/21 figures and remain overall high compared to the previous years, albeit 5% below the local target of 100%.

Table 4

Was BBV Admission Assessment carried out	16/17		17/18		18/19		19/20		20/21		21/22	
Yes	28	87.5%	25	92.6%	30	93.8%	29	85.3%	31	96.9%	20	95%
No	4	12.5%	2	7.4%	2	6.3%	5	14.7%	1	3.1%	1	5%

BBV Annual Assessment

During the audit period, 87 patients required an annual BBV assessment. Table 5, shows that 82% of the patients who required a BBV Annual Assessment had this completed between 1st August 2021 and 31st July 2022. This has decreased from 20/21 by 11.9%.

Table 5

Is the Annual BBV Assessment form completed on RiO	16/17		17/18		18/19		19/20		20/21		21/22	
Yes	66	77.6%	67	75.3%	78	91.8%	76	90.5%	77	93.9%	71	82%
No	19	17.1%	22	20.8%	7	7%	8	7%	5	6.1%	16	18%
Total	85		89		85		84		82		87	

Table 6, shows from the 18% (n=16) the reasons why these patients did not have an Annual BBV Assessment. There is no comparison data on previous years, as this is the first time the data has been analysed to this depth.

Table 6

Reasons	Number	
Assessment Out of Date	11	12.6%
Never had one since admission	4	4.6%
Patient refused	1	1.1%

BBV bloods testing

BBV bloods form part of the patient's annual health check. Table 7, shows that currently 97% of patient's have had their BBV bloods tested when offered an increase of 3% on 20/21

Table 7

Has patient been tested?	16/17		17/18		18/19		19/20		20/21		21/22	
Yes	82	73.9%	96	90.6%	91	91%	82	69%	107	93.9%	97	97%
No	24	21.6%	10	9.4%	7	7%	36	30%	5	4.4%	0	0
Patient declined	5	4.5%	-	-	2	2%	1	1%	2	1.8%	3	3%
Total	111		106		100		119		114		**100**	

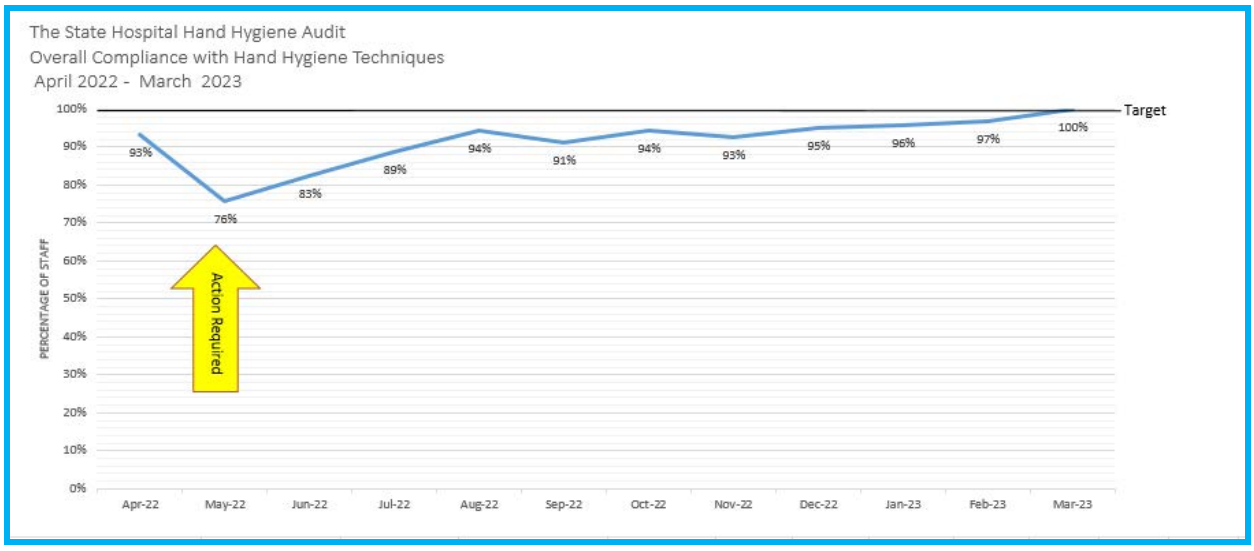
Hand Hygiene Compliance Audits

The hands of staff are the principal method by which micro-organisms are transmitted to patients. Hand washing is widely acknowledged as being one of the most important ways of preventing the spread of infection within healthcare settings. The messaging to reinforce this mode of transmission has been increased during the pandemic.

Hand Hygiene audits are completed by a member of staff within all clinical areas within the hospital. The auditor monitors 10 opportunities against 6 key moments (performing hand hygiene after removal of FRSM has been added). It is the opportunity not the person that is audited. 16 clinical areas are monitored and audits sent to the CQIF by the 20th of each month.

Chart 1, shows the overall compliance for the reporting period over the last 12 months. The current target set by the Infection Control Committee is 100%, this is supported by CEL 5 (2009).

Chart 1



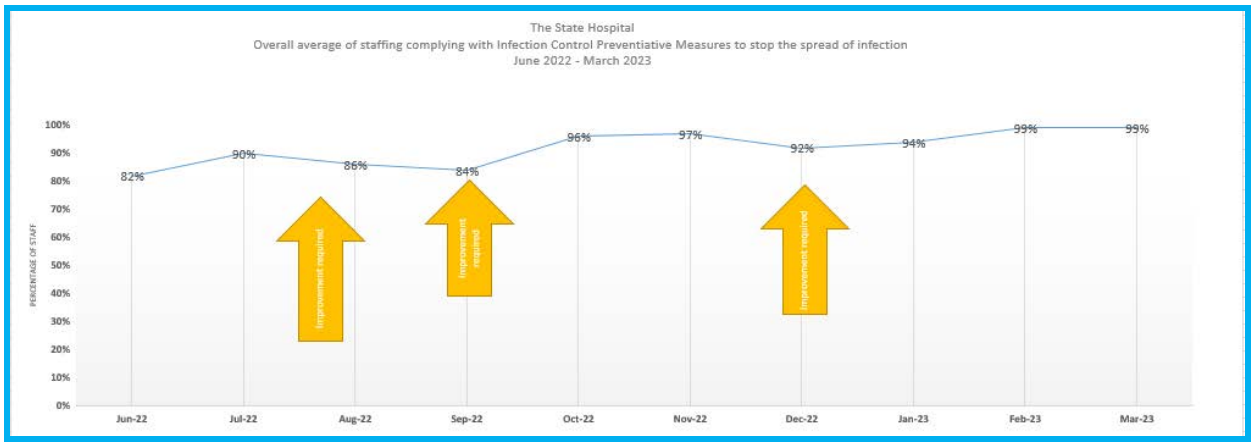
The CQIF communicates monthly with the Senior Charge Nurses and Charge Nurses areas of non-compliant with audit requirements. Improvements have been noticed throughout the review period, this will continue to be monitored by the Infection Control Team, Infection Prevention and Control Group, Hub Leadership Teams and ultimately the Infection Control Committee.

Infection Control Monthly Compliance Audits

An Infection Control practice audit tool was developed and implemented in June 2022, replacing the previous Covid Audit. The new audit tool looks at a range of Infection Control Practices to reduce the spread of infection across the site. This audit is completed in conjunction with the existing monthly hand hygiene audits. 16 clinical areas are monitored and audits sent to the CQIF by the 20th of each month.

Chart 2, shows the overall compliance for the reporting period over the last 8 months. The current target set by the Infection Control Committee is 95%. Data is only shown from June 2022 as this is when the audit observations changed to a range of infection control measures which reduces the spread of infection.

Chart 2



Education and Online modules

Staff education in the general principles of infection control is of significant importance. The hospital aims to sustain the low incidence of HAI and manage BBV Infection effectively and ensure safe working practices. Infection Control training is monitored by the Learning Centre and reported directly to line managers. Quarterly reports are presented to the Infection Control Committee.

An introduction to Infection Control continues to feature as part of the corporate Health and Safety Training Programme for clinical / non-clinical staff, due to Covid there were no courses delivered as this is a face-to-face method of teaching. The topics covered include the infection control structure, BBV awareness, hand hygiene, the management of patients with loose stools the management of clinical waste and Safe Management of Linen. This training has been delivered to both new staff and students during the review period.

Scottish Infection Prevention and Control Education Pathway (SIPCEP)

The Senior Management Team, in August 2017 requested that all staff must complete four core modules. Additional modules have been added to individual learning accounts depending on job role.

Training data was not available at time of submission but will be for the Clinical Governance Committee.

An introduction to Infection Control continues to feature as part of the induction program for student nurses, staff nurses and nursing assistants.

The infection control team are seeking to include infection control training for facilities staff. It is the infection control teams' understanding that a corporate induction programme will be developed and that an introduction to infection control will be included in this.

The topics covered include the infection control structure, BBV awareness, hand hygiene, the management of patients with loose stools, the management of clinical waste and the safe management of linen. Inductions for new staff including students have continued.

Person Centred Improvement Team/Patient Partnership Group

The SNIC attends the Patient Partnership meetings 6 monthly and as required to discuss any Infection Control issues that patients may have. The SNIC alongside the PCIT are reviewing ways to ensure that Carers views are represented on infection control matters.

Written communication has been developed in conjunction with the Person Centred and Improvement Lead to appraise patients of Covid, the limitations/restrictions in place and the vaccination programme.

Infection Control Updates

Infection control updates continue to be disseminated throughout the year. These updates provide information on infection control news and developments, both locally and nationally. The information is conveyed via the hospital intranet, staff bulletins, Vision magazine and through internal e-mails. More recently, the Infection Control Team have used "all users" emails and test messaging system to communicate throughout the hospital in relation to Covid issues. This service is has been extended to include all outbreaks. The Infection Control Team are keen to utilise the onelan system within the hospital in the future to promote infection, prevention and control.

7. Quality Improvement Activity

The focus of the year has been to minimise the risk of Covid transmission, facilitate vaccination clinics for patients and staff and review current infection control practice against the Infection Prevention and Control Standards (2022).

8. Planned Quality Assurance/Quality Improvement for the next year

Since recruiting to the CQIF for Infection control post in April 2023 there has been significant improvement in audit activity and improvement. In addition to the CQIF for Infection Control has increased resilience within the department and has been an asset during subsequent waves of the pandemic.

The Infection Control Team alongside the Lead Nurses/Skye Centre Manager undertake leadership walk rounds on a monthly basis. Verbal feedback is provide immediately with written feedback in within 14days. These leadership walk rounds will continue with additional support from members of the Infection Prevention and Control Group.

Identified issues and potential solutions

Challenges for incoming year

- To consider innovative ways to increase compliance with infection control training

- To continue to monitor DATIX with specific attention being placed on items being coded as clinical waste.
- To review DATIX coding with risk management department
- Introduction Hand Hygiene Peer audits
- Roll out new Cleaning Schedules across the site and commence audits

9. Next Review Date

November 2023 or sooner if areas of concern are identified.