

Borders NHS Board

HEALTHCARE ASSOCIATED INFECTION CONTROL AND PREVENTION REPORT – June 2013

Aim

The purpose of this paper is to update Board members of the current status of Healthcare Associated Infections (HAI) and infection control measures in NHS Borders.

Background

In line with the NHS Scotland HAI Action Plan 2008, there is a requirement for a HAI report to be presented to the Board on a two monthly basis.

Summary

This report provides an overview for Borders NHS Board of Infection Prevention and Control with particular reference to the incidence of Healthcare Associated Infections (HAI) against Scottish Government HEAT targets, together with results from cleanliness monitoring and hand hygiene audit results.

Recommendation

The Board is asked to **note** this report

Policy/Strategy Implications	This report is in line with the NHS Scotland HAI Action Plan
Consultation	Not applicable
Consultation with Professional Committees	Not applicable
Risk Assessment	Not applicable
Compliance with Board Policy requirements on Equality and Diversity	Yes
Resource/Staffing Implications	None identified

Approved by

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Healthcare Associated Infection Reporting Template (HAIRT)

Section 1 – Board Wide Issues

This section of the HAIRT covers Board wide infection prevention and control activity and actions. For reports on individual hospitals, please refer to the 'Healthcare Associated Infection Report Cards' in Section 2.

A report card summarising Board wide statistics can be found at the end of section 1

Key Healthcare Associated Infection Headlines for June 2013

- NHS Borders is currently borderline to achieving the *Staphylococcus aureus* Bacteraemia (SAB) 2013 HEAT target rate.
- NHS Borders currently has a *Clostridium difficile* infection (CDI) rate higher than the 2013 HEAT target rate.
- As the HEAT Target is based on 'per 1000 acute occupied bed days' we are unable to confirm NHS Borders' final position against the respective HEAT targets until official data is made available from Health Protection Scotland.

Staphylococcus aureus (including MRSA)

Staphylococcus aureus is an organism which is responsible for a large number of healthcare associated infections, although it can also cause infections in people who have not had any recent contact with the healthcare system. The most common form of this is Meticillin Sensitive *Staphylococcus Aureus* (MSSA), but the more well known is MRSA (Meticillin Resistant *Staphylococcus Aureus*), which is a specific type of the organism which is resistant to certain antibiotics and is therefore more difficult to treat. More information on these organisms can be found at:

Staphylococcus aureus : <http://www.nhsinform.co.uk/Health-Library/Articles/S/staphylococcal-infections/introduction>

MRSA: <http://www.nhsinform.co.uk/Health-Library/Articles/M/mrsa/introduction>

NHS Boards carry out surveillance of *Staphylococcus aureus* blood stream infections, known as bacteraemias. These are a serious form of infection and there is a national target to reduce them. The number of patients with MSSA and MRSA bacteraemias for the Board can be found at the end of section 1 and for each hospital in section 2. Information on the national surveillance programme for *Staphylococcus aureus* bacteraemias can be found at:

<http://www.hps.scot.nhs.uk/haic/sshaip/publicationsdetail.aspx?id=30248>

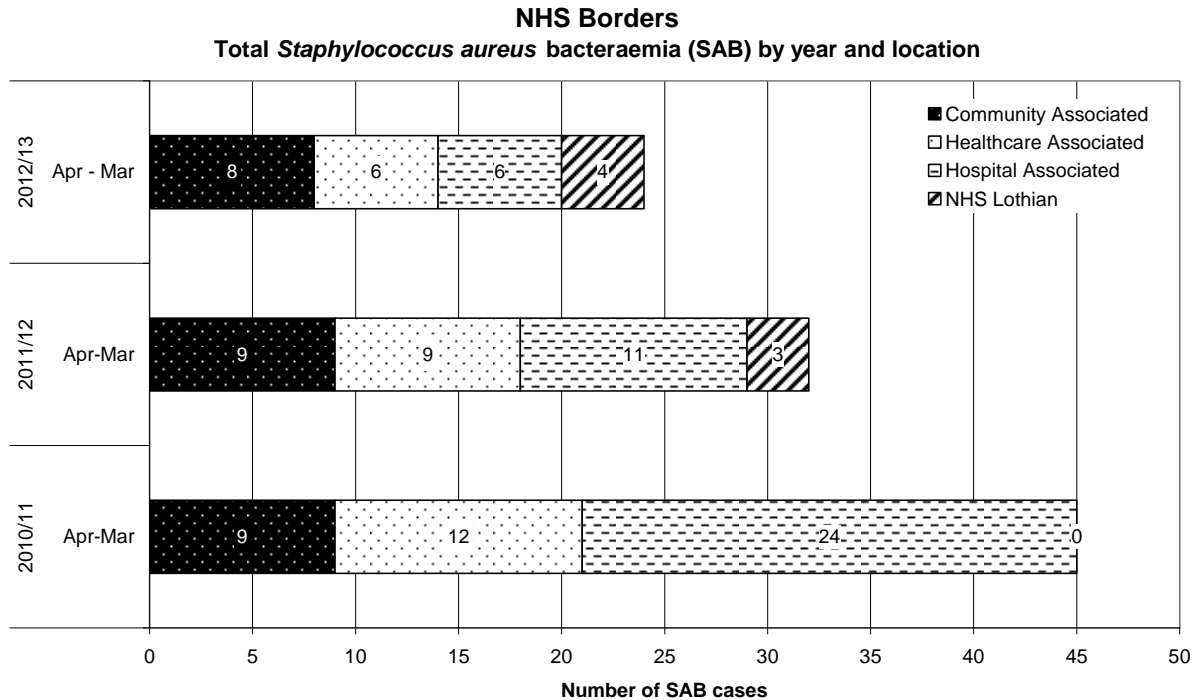
NHS Borders has a Scottish Government HEAT target to achieve a rate of 0.26 *Staphylococcus aureus* Bacteraemia (SAB) cases or less per 1000 acute occupied bed days by March 2013. This rate was the "best in class" rate achieved by a single Health Board in the year ending March 2010, and is considered to be achievable by all Boards.

Figure 5 page 14 gives an impression of NHS Borders currently having a SAB rate higher than the HEAT target. The latest data point on this graph (January 2012 – December 2012) is the most recent official data available from Health Protection Scotland.

However, significant improvements have been made in relation to SAB numbers with initial local data indicating that NHS Borders is currently borderline to achieving the HEAT target between April 2012 and March 2013.

This overall improvement is better displayed when comparing full year numbers as shown in Figure 1 below. Figure 1 highlights that NHS Borders reduced the number of SABs by 25% in 2012/13 (32 SABs 2011-12 : 24 SABs 2012-13).

Figure 1. NHS Borders total staphylococcus aureus bacteraemia (SAB) by year and location.



As the HEAT Target is based on 'per 1000 acute occupied bed days' we are unable to confirm our position against the 2012/13 HEAT target until official data is made available from Health Protection Scotland.

HEAT targets for 2013-14 include a new SAB target to further reduce healthcare associated infections so that by March 2015 NHS Boards' SAB cases are 0.24 or less per 1000 acute occupied bed days.

The Scottish Government acknowledge that some Boards may have a concern that the denominator chosen for HEAT targets may not be appropriate at a local level, thus making it unduly difficult to achieve the target. As a result, the Scottish Government have offered the opportunity for NHS Boards to write to the Scottish Government with evidence that the denominator rather than the lack of success in reducing SABs has impacted on delivery (CNO (2013) 2). NHS Borders is currently engaging with the Scottish Government on this point.

Every SAB case is subject to a rigorous review which includes a feedback process to the clinicians caring for the patient. The Prevention of SABs Group continues to meet every month to monitor the implementation of actions to reduce the risks associated with SABs. Since the Prevention of SABs Group was introduced during 2010 the number of SAB cases has reduced from 45 cases in year 2010/11 to 24 cases during year 2012/13. The Group's work continues with clinical services. An example is continuing to improve compliance relating to the insertion and maintenance of peripheral venous catheters (PVCs) (Refer to 'Infection Control Audits' section page 9 for additional information).

Section 2 of this report provides local surveillance data highlighting that SAB cases within the period March-May 2013 are MSSA and associated with out of hospital onset (Figure 7 page 16). NHS Borders community hospitals have not experienced SAB cases since June 2012 (Figure 8 page 17).

The Scottish Government has identified the need to develop a programme of interventions under the Healthcare Associated Infections Chief Nursing Officer Support Framework to help reduce SAB infections in order to support health boards deliver improvements for patients. This includes the need to focus on novel MSSA interventions that will deliver early results to support Boards' HAI HEAT target delivery. Local SAB surveillance data will contribute to this development.

***Clostridium difficile* infection (CDI)**

Clostridium difficile is an organism which is responsible for a large number of healthcare associated infections, although it can also cause infections in people who have not had any recent contact with the healthcare system. More information can be found at:

<http://www.nhsinform.co.uk/Health-Library/Articles/C/clostridium-difficile/introduction>

NHS Boards carry out surveillance of *Clostridium difficile* infections (CDI), and there is a national target to reduce these. The number of patients with CDI for the Board can be found at the end of section 1 and for each hospital in section 2. Information on the national surveillance programme for *Clostridium difficile* infections can be found at:

<http://www.hps.scot.nhs.uk/haic/sshaip/clostridiumdifficile.aspx?subjectid=79>

NHS Borders has a HEAT target to achieve a rate of 0.39 or less cases of *Clostridium difficile* infections (CDI) per 1000 total occupied bed days in patients aged 65 and over by the year ending March 2013. The rate of 0.39 is based on the best performing board as measured in the year ending March 2010, demonstrating that this rate should be achievable by all boards.

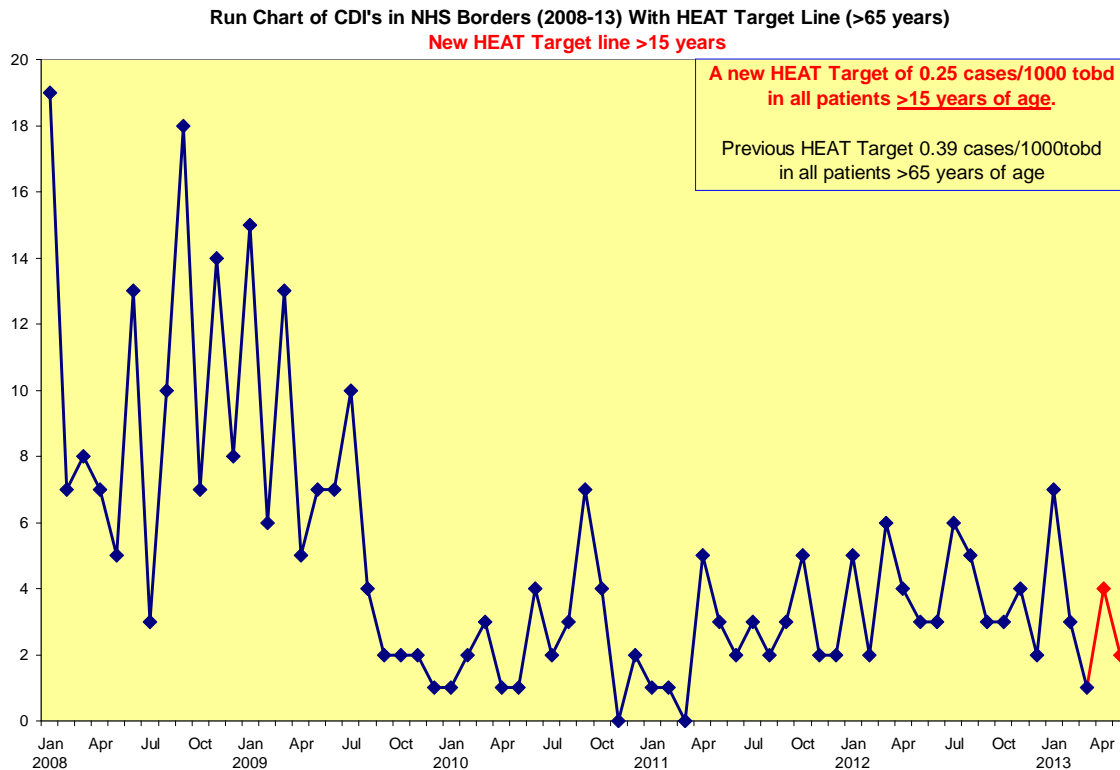
Following an increase in cases in July and August the latest data point on figure 6 page 14 (January 2012 – December 2012) indicates that NHS Borders CDI rate is currently above the level of the HEAT target rate at 0.44. After a period of comparative stability, local data indicates an additional increase in CDI cases during January 2013. This surveillance suggests that NHS Borders is likely to remain higher than the CDI HEAT target rate ending in March 2013.

As the HEAT Target is based on 'per 1000 total occupied bed days' we are unable to confirm our position against the HEAT target until official data is available from Health Protection Scotland.

NHS Scotland has recorded significant improvements in the prevention and control of *C. difficile* infections. However recent surveillance has been showing a levelling of the previous downward trend in *C. difficile* infections (Chief Nursing Officer letter 21 December 2012).

Figure 2 supports this observation by displaying an excellent overall improvement made by NHS Borders since the 2008/9 period followed by a levelling of this success.

Figure 2: Run Chart of CDI in NHS Borders 2008 – 2013



The total number of CDI cases in patients greater than 65 years of age (HEAT target category) peaked at 115 during 2008/9. The total number of CDI cases for the same age group during 2012/13 was 44.

Closer examination of total CDI cases within the HEAT target period April 2011 - March 2013 is displayed within Table 1. This compares total CDI cases for all recorded age groups and highlights an overall reduction in 2012/13 compared with 2011/12.

Age	2011/12	2012/13	Variance
65+	39	44	5
15-64	14	6	-8
Total	53	50	-3

Table 1: Total CDI cases comparison for 2011/12 and 2012/13

Similar to the SAB cases, section 2 of this report provides local surveillance data highlighting that CDI cases within the period March-May 2013 were associated with out of hospital onset (Figure 7 page 16). NHS Borders community hospitals have not experienced CDI cases within the last rolling year from June 2012 (Figure 8 page 17).

The revised HEAT Target for CDIs over the period 2013-2015 is now reduced to 0.25 cases or less per 1000 total occupied bed days, from 0.39 per 1000 total occupied bed days. This also includes all patients' greater than 15 years of age. The previous HEAT Target was based on patients greater than 65 years old. This change presents a significant challenge to NHS Borders over the next two years.

The Infection Prevention and Control Team have liaised with two health boards as a sharing practice exercise to assist with further improvements. Any areas of practice identified as having potential benefits will be carried forward to the recently established Prevention of CDI Group. This group will provide additional focus to this agenda. The outcomes and actions of all CDI severe case investigations will be monitored through this group and used to inform the progression of work-streams to support improvement.

Further to the Chief Nursing Officer and Chief Medical Officer letter 1st May 2013 (Healthcare Associated Infection (HAI) and Antimicrobial Resistance (AMR) Priorities 2013-15) the Scottish Antimicrobial Prescribing Group (SAPG) has agreed that from June 2013 the current *Clostridium difficile* infection (CDI) HEAT target indicator for primary care, seasonal variation of quinolones, should be replaced by a new reduction in total antibiotics indicator. The Antimicrobial Management Team continues to monitor antimicrobial prescribing rates in both acute and community Clinical Boards, and will include a renewed focus on dental antimicrobial prescribing.

Hand Hygiene

Good hand hygiene by staff, patients and visitors is a key way to prevent the spread of infections. More information on the importance of good hand hygiene can be found at:

<http://www.washyourhandsofthem.com/>

NHS Boards monitor hand hygiene and ensure a zero tolerance approach to non compliance. The hand hygiene compliance score for the Board can be found at the end of section 1 and for each hospital in section 2. Information on national hand hygiene monitoring can be found at:

<http://www.hps.scot.nhs.uk/haic/ic/nationalhandhygienecampaign.aspx>

The hand hygiene data tables contained within Figure 3 page 13 and Figure 6 page 15 are generated from wards conducting self-audits.

NHS Borders also continues to participate in national hand hygiene audits which are conducted every other month. The most recent published report is May 2013. During the audit period (18th-29th March 2013) NHS Borders achieved an overall compliance rate of 98%. The national average was 96%.

Cleaning and the Healthcare Environment

Keeping the healthcare environment clean is essential to prevent the spread of infections. NHS Boards monitor the cleanliness of hospitals and there is a national target to maintain compliance with standards above 90%. The cleaning compliance score for the Board can be found at the end of section 1 and for each hospital in section 2. Information on national cleanliness compliance monitoring can be found at:

<http://www.hfs.scot.nhs.uk/online-services/publications/ha/>

Healthcare environment standards are also independently inspected by the Healthcare Environment Inspectorate. More details can be found at:

<http://www.nhshealthquality.org/nhsqis/6710.140.1366.html>

High levels of cleanliness continue to be recorded through the monitoring process across NHS Borders estate. The data presented (Figure 3 page 13) is an average figure across the sites using the new national cleaning and estates monitoring tool that was implemented in April 2012.

Infection Incidents Resulting in Ward/Bay Closures

Table 2 presents a quarterly closure summary of wards and bays due to infection control activity within NHS Borders. The sole cause of closure during the period of display was viral gastroenteritis. The most recent HPS data (Week 23 2013 Norovirus Monday Point Prevalence in NHS Scotland) indicates an overall reduction in Norovirus activity across Scotland during May 2013 compared with earlier months in 2013.

Infection Control Closure Summary - Viral Gastroenteritis																	
	2012/2013												2013/2014				
	Qtr 3						Qtr 4						Qtr 1				
	Oct		Nov		Dec		Jan		Feb		Mar		Apr		May		
	Bays	Wards	Bays	Wards	Bays	Wards	Bays	Wards	Bays	Wards	Bays	Wards	Bays	Wards	Bays	Wards	
Ward 4			1		2												
Total days			3 days		5 days												
Ward 5			2		1												
Total days			5 days		2 days												
Ward 6			2		1	1	3	1	2		3	1			1	1	
Total days			16 days		3 days	1 day	2 days	1 day	5 days		4 days	4 days			2 days	2 days	
Ward 7			1				1		1								
Total days			1 day						1 day								
Ward 8																	
Total days																	
Ward 9					2				1								
Total days									2 days								
DME			2	1	1	1					2	1	2	1			
Total days			9 days	5 days	4 days	3 days					4 days	6 days	8 days	2 days			
Stroke Unit																	
Total days																	
Ward 12			2	1	2	1	1						2	1	1		
Total days			3 days	13 days	8 days	5 days	7 days						5 days	3 days	3 days		
Ward 14			2		2	1	2										
Total days			14 days		8 days	7 days	2 days										
Ward 15																	
Total days																	
Ward 16			1														
Total days			3 days														
Ward 17																	
Total days																	
Kelso																	
Total days																	
Haylodge									1								
Total days									5 days								
Hawick																	1
Total days																	2 days
Knoll																	
Total days																	
TOTAL	0	0	13	2	11	4	7	1	5	0	5	2	4	2	2	2	2

The number of bay closures indicated in a month is the maximum bay closures for that period
When ward has been closed during a month, the bay closures indicated during this period have either preceded or followed the ward closure
Ward/ bay closures running over consecutive months are part of one episode

Table 2: NHS Borders infection control closure summary due to GI illness

Other Healthcare Associated Infections (HAI) Related Activity

HAI Annual Report 2012

- This Health Protection Scotland (HPS) report (May 2013) reflects the HAI and Antimicrobial resistance (AMR) containment work undertaken in NHSScotland during 2012. The current epidemiology of HAI in NHSScotland is used to highlight the necessity to refocus priorities to ensure continuing success in the strategy to reduce HAI and contain AMR. In summary, the results from the national surveillance data indicate that the decline in infection rates previously reported have not continued during 2012. Surgical site infections (SSI) continue to place a significant burden on acute hospitals representing almost one fifth of all HAI.

SSI related to hip arthroplasty has remained stable between 2010-2012. HPS suggest that consideration is required as to whether the irreducible minimum SSI related to hip arthroplasty has been reached. However, the report identifies that the number of national SSI cases following hip arthroplasty is small (n=57 during 2012), therefore these data should be interpreted with due caution. SSI following hip arthroplasty within NHS Borders is discussed in the following section. The incidence of SSI following caesarean section continues to be observed. Comparison with local surveillance indicates that NHS Borders is below the national average for caesarean section SSI (Refer to Table 3 page 11).

NHS Borders Surgical Site Infection (SSI) Surveillance

- NHS Borders participates in a national infection surveillance programme relating to specific surgical procedures. This is coordinated by HPS and uses national definitions and methodology which enable comparison with overall NHS Scotland infection rates.

The Surgical Site Infection (SSI) surveillance is conducted on the following range of procedures:-

- Caesarean section
- Hip Arthroplasty
- Knee Arthroplasty
- Colorectal Surgery

Table 3 page 11 shows the results of the surgical site infection (SSI) surveillance data for each procedure since surveillance started.

During 2012 there was an increase in SSIs following hip arthroplasty operations. A multi disciplinary short life working group (SLWG) was formed to investigate all aspects of the patient pathway with respect to identifying potential sources of increased environmental infection load, or decrease in patient immunocompetence. A review did not identify any common factors that could have been indicative of an outbreak. The infections are from a range of organisms in both elective and emergency cases, undertaken by different surgeons.

Following a period of no SSIs (November 2012 – January 2013) there were, however, 3 new SSI cases in February - April 2013 following hip arthroplasty. The SLWG has since reviewed its action trackers with renewed impetus and focus on collaborative working with Ward 9, Theatres and the Infection Prevention and Control Team to expedite a resolution to this current issue. Current action trackers are in place for Ward 9 and Theatres/ASDU, respectively.

Staff training

- Funding of circa £29,000 has been secured from NHS Education for Scotland (NES) for education on the Aseptic Technique e-learning module. The Infection Prevention and Control Team are working in collaboration with the Training Dept. to progress a learning and development programme on this module. Initial planning aims to complete all training by the end of October 2013 involving staff members from both BGH and community hospital locations.

Infection Control Audits

- In January, wards in Borders General Hospital (BGH) were audited for compliance with the best practice 'care bundle' relating to the use of peripheral venous catheters (PVCs). Compliance with best practice is important as these devices are commonly used and are a risk factor for patients developing a *staphylococcus aureus* infection. Overall compliance had dropped since a previous audit in September 2012. Initial improvement in compliance has not been sustained. Further work is required to ensure additional improvement is gained and maintained as described below.

The Infection Prevention and Control Team (IPCT) have supported the BGH Hospital Executive Team to review the PVC audit data for detailed extraction of information to allow a targeted intervention for service improvement. This has identified the insertion bundle and medical staff as areas for potential improvement. PVC insertion is predominantly a medical procedure. The IPCT has made several recommendations with actions allocated to individuals and is collaborating with medical staff, procurement dept. and the training dept. to deliver these actions. A re-audit of compliance was conducted in late May 2013 that showed an increase in compliance with the maintenance bundle, but a further reduction in compliance with the insertion bundle. It is possible that the reviewed measures remain to be embedded and will require further development. However, the IPCT have taken further action at an earlier stage to specifically target medical staff in areas demonstrating low compliance.

- The Infection Prevention and Control Team have taken a lead role alongside Patient Safety to develop a PVC standard operating procedure.

2012/13 Infection Control Work Plan

- The Infection Prevention and Control Team have finalised their 2012/13 work plan and implemented the new 2013/14 work plan.

Healthcare Environment Inspectorate

- NHS Borders is currently preparing their HAI Self Assessment. This work is due for submission to HEI by 1st July 2013.

In February 2013, the Healthcare Environment Inspectorate (HEI) published a report following an unannounced inspection of Borders General Hospital in December 2012.

The report confirmed that NHS Borders has made improvements since the previous inspection and is complying with the majority of NHS QIS HAI standards to protect patients, staff and visitors from the risk of acquiring an infection.

The inspection resulted in three requirements and two recommendations. A subsequent action plan was developed to address these items. A number of the outlined actions have been completed with the remainder being within their target dates. A 16-week post-inspection follow-up report has been completed.

HEI consulted with NHS Boards on proposals and recommendations for inspections of non-acute/community hospitals. These inspections will be undertaken as part of the current cycle of inspections commencing in autumn 2013. The first inspection will be announced, which will promote the learning and development process that was experienced during the early acute hospital inspections. This is considered as a valuable step, particularly for staff members entering a new inspection process, which will help ensure the community hospitals meet HEI standards similar to those achieved within BGH. In addition, Community hospitals are included within Borders Executive Team inspections to help prepare for the HEI inspection process.

Surgical Site Infection (SSI) Data Table

	Year	NHS Borders				NHS Scotland		Comments
		Number of Procedures	Number of Surgical Site Infections (SSIs)	SSI Rate %	95% Confidence Interval	National SSI Rate %	95% Confidence Interval	
C-Section	2009	222	1	0.50	0.1 to 2.5	2.6	2.3 to 2.8	
	2010	257	3	1.20	0.4 to 3.4	2.6	2.4 to 2.9	
	2011	222	1	0.00	0 to 3.3	1.4	1.1 to 1.8	
	2012*	244	1	0.40	0.1 to 2.5	2.0	1.8 to 2.3	
	2013*	98	0	0.00	0.0 to 5.7	1.3	0.9 to 1.8	
Hip Arthroplasty	2009	230	2	0.90	0.2 to 3.1	1.2	1.0 to 1.4	
	2010	239	0	0.00	0 to 1.8	0.8	0.7 to 1.1	
	2011	222	0	0.00	0 to 3.3	1.4	1.1 to 1.8	
	2012*	281	8	2.80	1.4 to 5.5	0.8	0.6 to 1.0	
	2013*	147	3	2.56	0.6 to 7.7	1.0	0.6 to 1.7	
Knee Arthroplasty	2011	154	1	0.68	0 to 2.4	0.2	0.1 to 0.5	Please note the small number of infections and procedures which impacts on the overall SSI rate.
	2012*	136	0	0.00	0 to 2.7	0.2	0.1 to 0.3	
	2013*	83	1	1.50	0.0 to 8.4	0.1	0.0 to 0.7	
Colorectal Surgery	2012*	80	2	2.50	0.7 to 8.7	15.0	11.4 to 19.5	Large Bowel
	2012*	4	0	0.00	0 to 49.0	0.0	0 to 49.0	Small Bowel
	2013*	37	4	10.81	1.1 to 28.3	16.1	9.0 to 27.2	Large Bowel
	2013*	2	0	0.00	0 to 79.3	66.7	20.8 to 93.9	Small Bowel

*NB. 2012/2013 data is provisional and may be subject to revision once validated by Health Protection Scotland

Table 3: Surgical Site Infection Data Table

Healthcare Associated Infection Reporting Template (HAIRT)

Section 2 – Healthcare Associated Infection Report Cards

The following section is a series of 'Report Cards' that provide information, for each acute hospital [and key community hospitals – *delete if appropriate*] in the Board, on the number of cases of *Staphylococcus aureus* blood stream infections (also broken down into MSSA and MRSA) and *Clostridium difficile* infections, as well as hand hygiene and cleaning compliance. In addition, there is a single report card which covers all community hospitals [which do not have individual cards], and a report which covers infections identified as having been contracted from outwith hospital. The information in the report cards is provisional local data, and may differ from the national surveillance reports carried out by Health Protection Scotland and Health Facilities Scotland. The national reports are official statistics which undergo rigorous validation, which means final national figures may differ from those reported here. However, these reports aim to provide more detailed and up to date information on HAI activities at local level than is possible to provide through the national statistics.

Understanding the Report Cards – Infection Case Numbers

Clostridium difficile infections (CDI) and *Staphylococcus aureus* bacteraemia (SAB) cases are presented for each hospital, broken down by month. *Staphylococcus aureus* bacteraemia (SAB) cases are further broken down into Meticillin Sensitive *Staphylococcus aureus* (MSSA) and Meticillin Resistant *Staphylococcus aureus* (MRSA). Data are presented as both a graph and a table giving case numbers. More information on these organisms can be found on the NHS24 website:

Clostridium difficile : http://www.nhs24.com/content/default.asp?page=s5_4&articleID=2139§ionID=1

Staphylococcus aureus : http://www.nhs24.com/content/default.asp?page=s5_4&articleID=346

MRSA: http://www.nhs24.com/content/default.asp?page=s5_4&articleID=252§ionID=1

For each hospital the total number of cases for each month are those which have been reported as positive from a laboratory report on samples taken more than 48 hours after admission. For the purposes of these reports, positive samples taken from patients within 48 hours of admission will be considered to be confirmation that the infection was contracted prior to hospital admission and will be shown in the "out of hospital" report card.

Understanding the Report Cards – Hand Hygiene Compliance

Good hand hygiene is crucial for infection prevention and control. More information can be found from the Health Protection Scotland's national hand hygiene campaign website:

<http://www.washyourhandsofthem.com/>

Hospitals carry out regular audits of how well their staff are complying with hand hygiene. The first page of each hospital report card presents the percentage of hand hygiene compliance for all staff in both graph and table form.

Understanding the Report Cards – Cleaning Compliance

Hospitals strive to keep the care environment as clean as possible. This is monitored through cleaning compliance audits. More information on how hospitals carry out these audits can be found on the Health Facilities Scotland website:

<http://www.hfs.scot.nhs.uk/online-services/publications/hai/>

The first page of each hospital Report Card gives the hospitals cleaning compliance percentage in both graph and table form.

Understanding the Report Cards – 'Out of Hospital Infections'

Clostridium difficile infections and *Staphylococcus aureus* (including MRSA) *bacteraemia* cases are all associated with being treated in hospitals. However, this is not the only place a patient may contract an infection. This total will also include infection from community sources such as GP surgeries and care homes and. The final Report Card report in this section covers 'Out of Hospital Infections' and reports on SAB and CDI cases reported to a Health Board which are not attributable to a hospital. Given the complex variety of sources for these infections it is not possible to break this data down in any more detail.

NHS Borders Board Report Card

The HEAT target graphs on the following page include the targets to be achieved by 31st March 2013. These targets are a rate of 0.39 cases of CDI per 1000 occupied bed days for patients aged 65+, and a rate of 0.26 SAB cases per 1000 acute occupied bed days. The last data point on these graphs (Mar 12 - Jan 13) is confirmed. We are currently awaiting official data from Health Protection Scotland to populate the end of year data point Apr 12 - Mar 13.

The hand hygiene compliance data is now based on monthly patient safety audit. National hand hygiene monitoring continues on a bi-monthly basis. Due to the implementation of a new national reporting tool, from April 2012, data for cleanliness and estates monitoring is an average figure and subject to future revision.

Hand Hygiene Monitoring Compliance (%)

Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
96.8	98.9	98.7	99.4	99.5	97.9	98.4	99.0	98.6	99.1	98.6	98.6

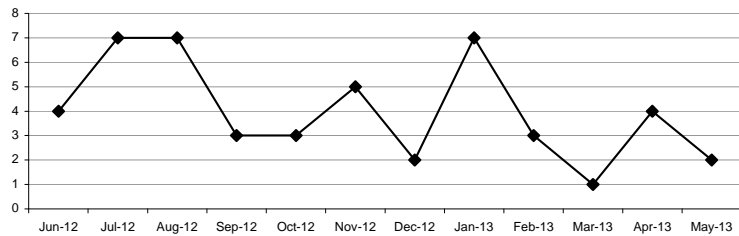
Cleaning Compliance (%)

Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
97.6	97.1	98.0	96.7	96.1	96.4	97.8	96.9	97.1	97.8	98.0	96.9

Estates Monitoring Compliance (%)

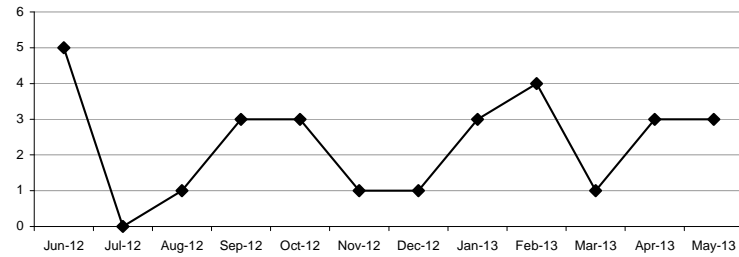
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
98.5	97.3	98.4	97.5	98.5	96.4	98.3	98.3	98.5	98.5	98.2	98.1

Clostridium difficile Cases (ages 15 and over)



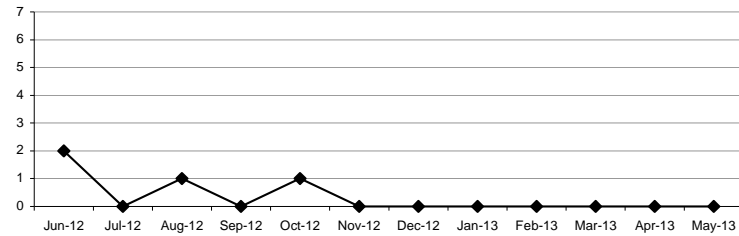
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
4	7	7	3	3	5	2	7	3	1	4	2

Total Staphylococcus aureus Bacteraemia Cases (all ages)



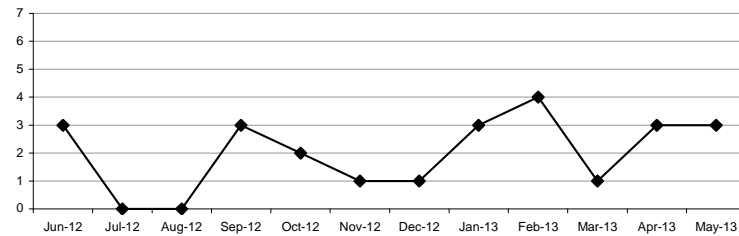
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
5	0	1	3	3	1	1	3	4	1	3	3

MRSA Bacteraemia Cases (all ages)



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
2	0	1	0	1	0	0	0	0	0	0	0

MSSA Bacteraemia Cases (all ages)

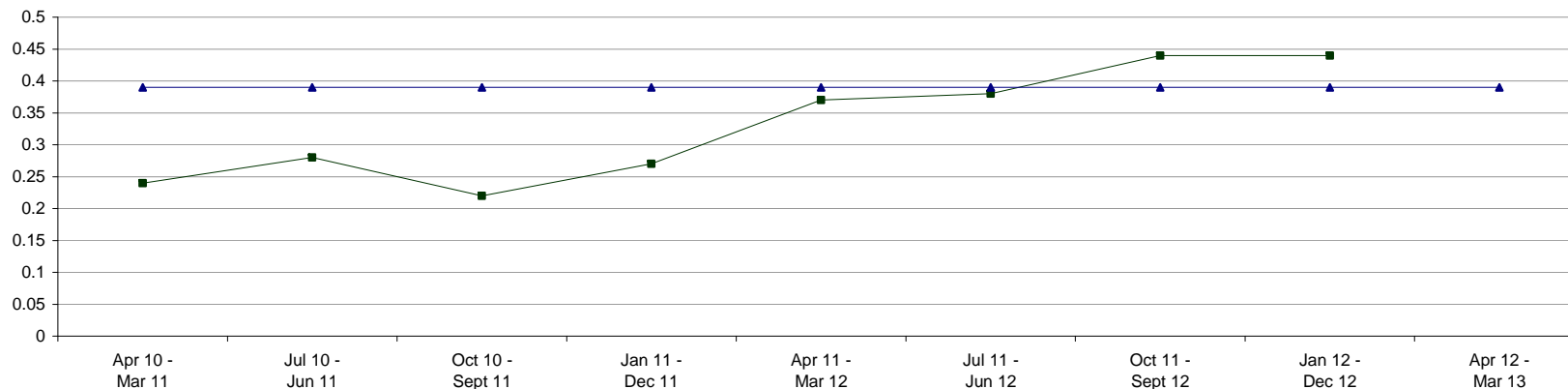


Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
3	0	0	3	2	1	1	3	4	1	3	3

Figure 3: NHS Borders Board Report Card

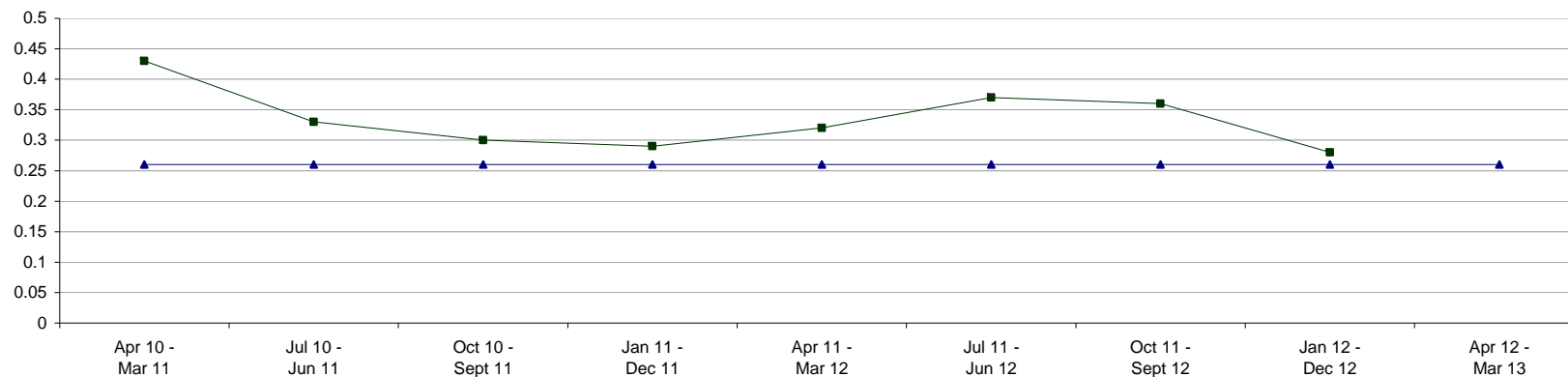
Figure 4: Qtr rolling year CDI cases per occupied bed days

Quarterly rolling year *Clostridium difficile* Infection Cases per 1000 total occupied bed days for HEAT Target Measurement



	Apr 10 - Mar 11	Jul 10 - Jun 11	Oct 10 - Sept 11	Jan 11 - Dec 11	Apr 11 - Mar 12	Jul 11 - Jun 12	Oct 11 - Sept 12	Jan 12 - Dec 12	Apr 12 - Mar 13
Actual Performance	0.24	0.28	0.22	0.27	0.37	0.38	0.44	0.44	
Target	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.39

Quarterly rolling year *Staphylococcus aureus* Bacteraemia Rates per 1000 Acute Occupied Bed Days for HEAT Target Measurement



	Apr 10 - Mar 11	Jul 10 - Jun 11	Oct 10 - Sept 11	Jan 11 - Dec 11	Apr 11 - Mar 12	Jul 11 - Jun 12	Oct 11 - Sept 12	Jan 12 - Dec 12	Apr 12 - Mar 13
Actual Performance	0.43	0.33	0.30	0.29	0.32	0.37	0.36	0.28	
Target	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26

Figure 5: Quarterly rolling year SAB cases per 1000 occupied bed days

Borders General Hospital Report Card

There have been no acute hospital associated CDI cases within the last quarter year period.

There have been no acute hospital associated cases of MRSA or MSSA bacteraemia within the last quarter year period.

The hand hygiene data in this report card is based on monthly patient safety audits conducted by each ward.

The hand hygiene, cleaning and estates data in this report card reflect overall compliance in Borders General Hospital.

Hand Hygiene Monitoring Compliance (%)

Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
98.7	99.0	98.7	99.4	99.4	97.7	98.0	98.7	98.4	98.9	98.9	98.4

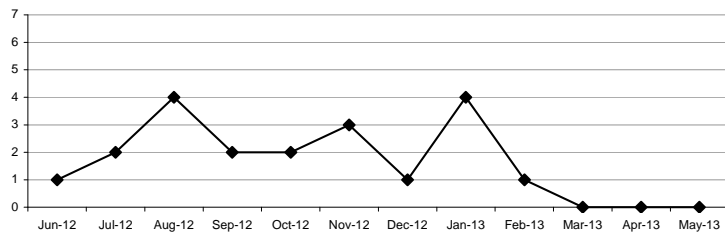
Cleaning Compliance (%)

Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
97.5	97.3	98.0	97.2	97.2	97.0	98.2	96.8	97.7	97.8	97.8	97.1

Estates Monitoring Compliance (%)

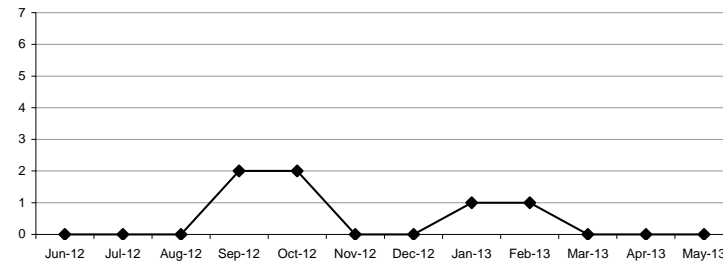
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
97.8	97.3	98.5	98.3	98.4	98.0	98.7	98.3	98.4	98.5	98.7	98.7

Clostridium difficile Cases (ages 15 and over)



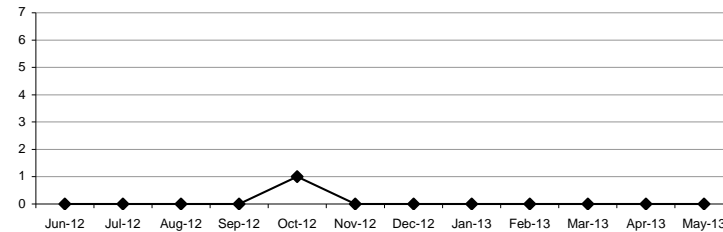
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
1	2	4	2	2	3	1	4	1	0	0	0

Total Staphylococcus aureus Bacteraemia Cases (all ages)



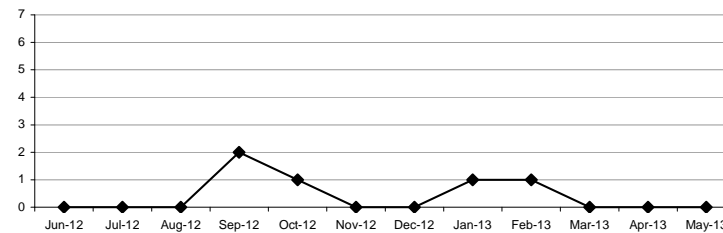
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
0	0	0	2	2	0	0	1	1	0	0	0

MRSA Bacteraemia Cases (all ages)



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
0	0	0	0	1	0	0	0	0	0	0	0

MSSA Bacteraemia Cases (all ages)



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
0	0	0	2	1	0	0	1	1	0	0	0

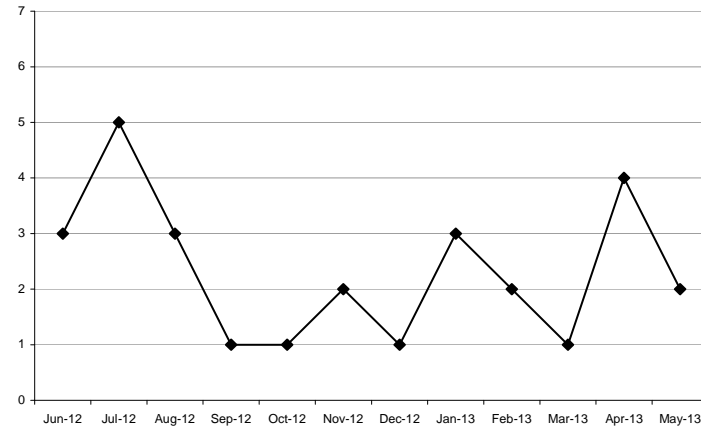
Figure 6: Borders General Hospital Report Card

Out of Hospital Infections

Out of Hospital CDI cases showed an increase in April 2013.

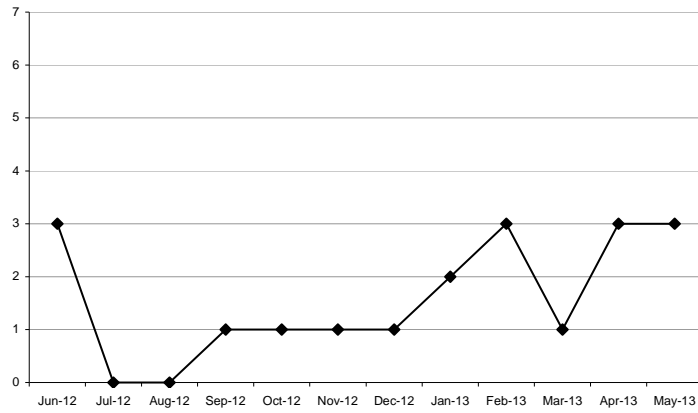
Out of Hospital cases of MSSA bacteraemia showed increases in April and May 2013, whilst there have been no cases of Out of Hospital MRSA bacteraemia since September 2012.

Clostridium difficile Infection Cases



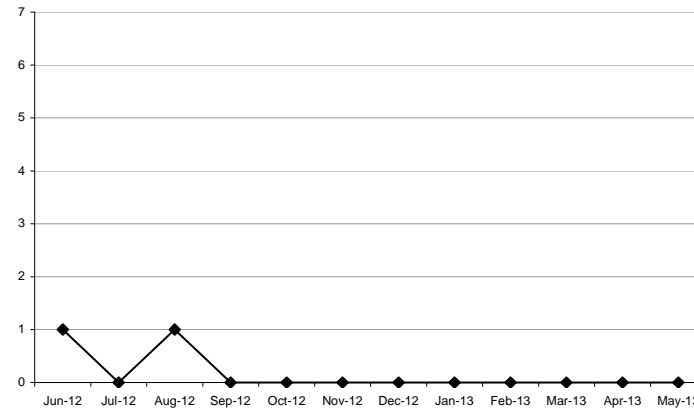
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
3	5	3	1	1	2	1	3	2	1	4	2

MSSA Bacteraemia Cases



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
3	0	0	1	1	1	1	2	3	1	3	3

MRSA Bacteraemia Cases



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
1	0	1	0	0	0	0	0	0	0	0	0

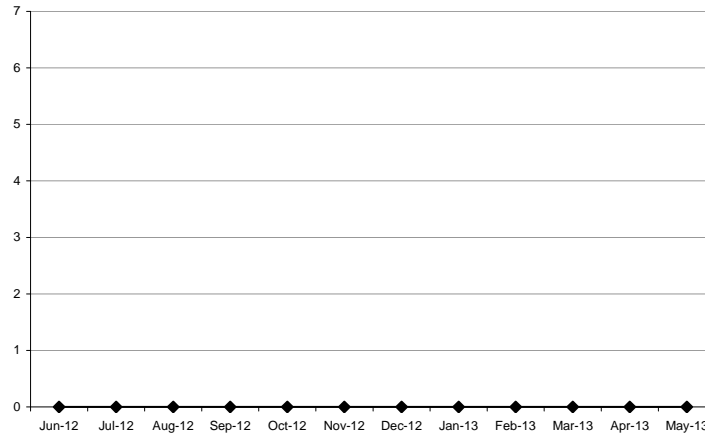
Figure 7: Out of Hospital Infections Report Card

Community Hospitals

There have been no community hospital associated CDI cases within the last year.

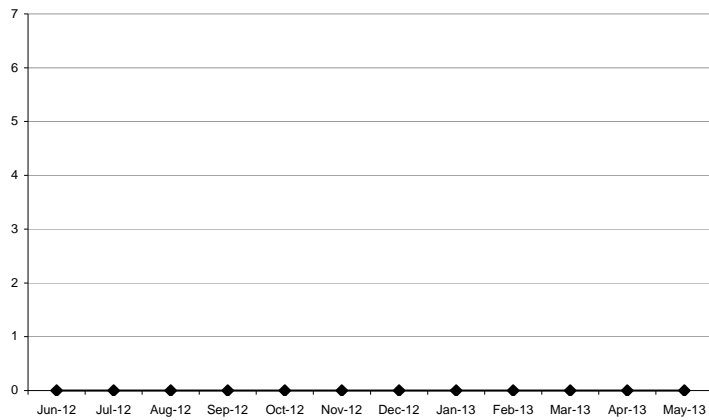
There have been no community hospital associated cases of MRSA or MSSA bacteraemia within the last year.

Clostridium difficile Infection Cases



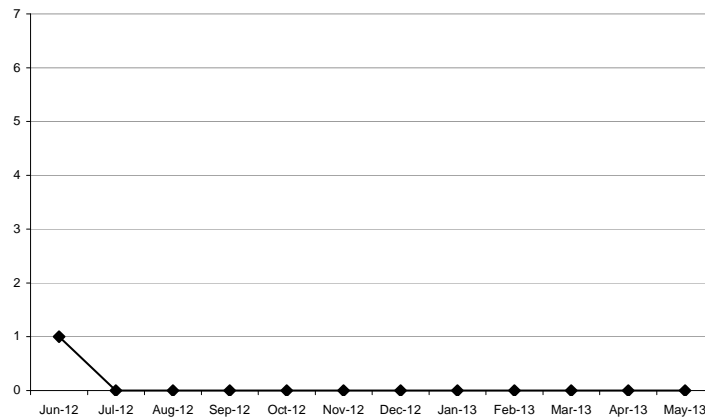
Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
0	0	0	0	0	0	0	0	0	0	0	0

MSSA Bacteraemia Cases



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
0	0	0	0	0	0	0	0	0	0	0	0

MRSA Bacteraemia Cases



Jun-12	Jul-12	Aug-12	Sep-12	Oct-12	Nov-12	Dec-12	Jan-13	Feb-13	Mar-13	Apr-13	May-13
1	0	0	0	0	0	0	0	0	0	0	0

Figure 8: Community Hospitals Report Card