WELSH HEALTH CIRCULAR

Issue Date: 8 July 2019

STATUS: ACTION & INFORMATION
CATEGORY: QUALITY AND SAFETY

Title: AMR & HCAI IMPROVEMENT GOALS FOR 2019-20

Date of Expiry/Review: 31 March 2020

For action:
Health Boards/Trusts:
- Chief Executives
- Medical Directors
- Nurse Executive Directors
- Infection Control Doctors & Nurses
- Directors of Public Health
- Hospital Chief Pharmacists
- Dental Officers

PHW:
- HCAI & AMR Programme Leads
- CCDCs
- Health Protection Teams

NWSSP:
- For distribution to GP practices, dental practices and community pharmacists

For information:
Welsh Government:
- DG/Chief Executive NHS Wales
- Deputy Chief Exec NHS Wales
- Professional & Policy Leads
- DHSS Operations Team
- DHSS Comms Team
- DHSS Digital Team

NHS Wales:
- Chairs
- NHS Direct Wales

Sender: Frank Atherton, Chief Medical Officer/Medical Director; Jean White, Chief Nursing Officer; Andrew Evans, Chief Pharmaceutical Officer; Colette Bridgeman, Chief Dental Officer

DHSS Welsh Government Contact: Catherine Cody catherine.cody@gov.wales, Tel: 03000 251443
HCAIs & Blood Safety Policy Branch
Dear colleagues,

**AMR & HCAI IMPROVEMENT GOALS FOR 2019-20**

The NHS in Wales has made good progress in relation to the HCAI & AMR improvement goals set out for 2018-19. These improvements are testament to the hard work undertaken by the NHS in Wales.

Reductions in *Clostridium difficile* (*C. difficile*) were particularly impressive in 2018-19. 27% fewer cases of *C. difficile* were recorded across Wales in 2018-19 as compared with 2017/18. All Health Boards have been able to reduce their burden of *C. difficile* disease compared with 2017/18. Overall in Wales there have also been reductions in *Escherichia coli* (*E.coli*) blood stream infections (BSI) with 5% fewer cases than in 2017-18 and meticillin resistant *Staphylococcus aureus* (MRSA) BSI, 24% fewer cases than in 2017-18.

Primary care prescribing of antimicrobials has continued to reduce during 2018/19 building on the 12% reduction in prescribing seen between 2013 and 2017. There is still however a wide variation of practice across our services. In hospital care two Health Boards are on target to meet the 55% goal for access category antimicrobials.


Improvement goals for HCAI & AMR for 2019-20 are set out at Annex 1 and build on the achievements seen across the NHS in Wales during 2018/19 and reflect the challenges set out in the UK AMR Strategy. We expect you to report on progress against these improvement goals at the Quality and Delivery meetings.

The key areas that we are expecting you to deliver on are:

- An integrated “whole system approach” to AMR and HCAI.
  - Evidence will be required that an integrated approach is being taken across both community and hospital care settings
- Improving antimicrobial stewardship:
  - Ensuring that all antimicrobial prescriptions in hospitals adhere to the principles of “Start Smart then Focus” (SSTF).
  - Ensuring that there is an accountable clinical lead in each of the neonatal midwifery services to oversee implementation of the Kaiser Permanente Sepsis Risk Calculator in Wales aimed at reducing inappropriate antibiotic use in newborns.
  - Ensuring that indications for antimicrobial prescriptions are documented in primary care and improving the diagnosis and management of UTI.
- Improving prevention, control and management of infections to deliver significant change in key infections.
  - Implementing quality improvement projects to deliver evidence based interventions to prevent UTI, sepsis and *C. difficile* disease.
Wales, alongside the other UK countries, is fully signed up to the 20 Year Vision and the five-year national action plan. To support this commitment Public Health Wales have identified funds as part of their £1.1m revenue investment to strengthen the surveillance and analysis of antimicrobial consumption and resistance data, including improved analyst capacity and support for IT developments to improve access to surveillance data.

Significant financial implications remain. A centrally managed (once for Wales), but locally focused community infection prevention and antimicrobial stewardship resource is vital to the success of the action plan and strategy. Salary costs for this community resource have been estimated to total £1.65m per annum once fully established and it is envisaged full annual costs would be incurred from 2020/21 onwards. The community model developed consists of two Community IP&C Nurses (Band 7) and one Community Antimicrobial Pharmacist (8a) per Health Board supported by a Lead Community IP&C nurse (8b) and Lead Community Antimicrobial Pharmacist (8b) within Public Health Wales.

This model and costings are being considered as part of the wider service development proposal to strengthen the whole system approach to our National Health Protection Service. A workshop was held in May, with Health Board and Trust Executive Directors, to discuss the proposed model. A further paper outlining the way forward and funding expectations will now be presented to NHS Chief Executive’s over the summer.

We look forward to working with you on the 5-year national action plan and making significant progress towards our 20 year vision.

Yours sincerely,

Dr Frank Atherton
Chief Medical Officer
Medical Director NHS Wales

Professor Jean White CBE
Chief Nursing Officer
Nurse Director NHS Wales

Andrew Evans
Chief Pharmaceutical Officer

Colette Bridgman
Chief Dental Officer
OPTIMISING USE OF ANTIMICROBIALS

1. Antimicrobial Consumption:

**Primary Care:**

The overarching UK AMR strategy ambition is to reduce antimicrobial consumption in primary care by 25% from baseline year of 2013 by 2024.

Good progress has been made in primary care with a 12% reduction in antimicrobial consumption between 2013–2017 and further progress made in 2018-19.

**The Improvement Goal for Wales 2019-20:**

1. To reflect the UK AMR strategy target, the primary care services in Wales will be expected to achieve a 25% reduction in antimicrobial prescribing compared with the baseline year of 2013 by 2024. Detailed trajectories including year on year requirements for reduction by HB will be produced by the Public Health Wales HARP team and distributed in June / July 2019 to coincide with the publication of the final position of HBs against the 2018-19 antimicrobial prescribing goals.

**Hospital Care:**

Few HBs will achieve the access target set for 2018-19 and at present no HB is on target to achieve the 5% reduction in total volume of antimicrobials set for 2018/19.

The overarching UK AMR strategy ambition is to reduce “Reserve” and “Watch” antibiotics by 10% - but there is as yet a lack of clarity regarding the baseline year against which this reduction is due to be achieved.

**The Improvement Goals for Wales 2019-20:**

1. Increase the proportion of antibiotic usage within the WHO Access category to ≥55% of total antibiotic consumption (as DDD).

   Public Health Wales’ HARP team will also report on the proportions of “Reserve” and “Watch” antibiotic in use within Health Boards to provide the information that underpins the overarching UK AMR strategy ambition to reduce reserve and watch category antimicrobial usage.

2. **Antimicrobial Stewardship:**

The Improvement Goals for Wales 2019-20:

**Primary Care:**

1. All prescribers should document indications for all antimicrobial prescriptions; it is expected that an appropriate read code will be entered whenever antimicrobials are prescribed in line with good prescribing practice. Primary care clusters should ensure urgent dental cases are seen by dental services rather than by the GMS.

2. **Wales Quality Improvement: Antimicrobial Stewardship - Supporting the multidisciplinary diagnosis & management of UTI.** Quality Improvement materials are available to support GPs and primary care clusters to review the multidisciplinary diagnosis and management of adults with suspected urinary tract infection.

Four UTI audits based on NICE quality standards & PHW UTI standards are included and can be found at: [https://phw.nhs.wales/services-and-teams/harp/urinary-tract-infection-uti-resources-and-tools/](https://phw.nhs.wales/services-and-teams/harp/urinary-tract-infection-uti-resources-and-tools/)

Dental services can access quality improvement advice and support on antimicrobial prescribing from the HEIW (Dental Deanery).

**Hospital care:**

1. All Health Boards and Velindre NHS Trust will implement the principles of “Start Smart then Focus” in all antimicrobial prescribing and will demonstrate compliance by using the Start Smart then Focus (SSTF) audit tool provided by Public Health Wales. This should be done in conjunction with the use of the National Early Warning Score (NEWS) and Sepsis 6 bundle. [http://www.1000livesplus.wales.nhs.uk/ad-in-hospital](http://www.1000livesplus.wales.nhs.uk/ad-in-hospital)

2. **Surgical antimicrobial prophylaxis should be targeted as an area for improvement to ensure that prophylaxis is given according to national recommendations, which in the main are for single dose or <24 hour delivery of antimicrobial prophylaxis.** This will be supported by the development of a Surgical Site Infection Surveillance module in ICNet with a focus on colo-rectal surgery in addition to the currently mandated SSI surveillance in orthopaedics and C-section surgery.

Health Boards must ensure that data is collected on antimicrobial prophylaxis for surgery either through their theatre systems or alternative method.
LOWER THE BURDEN OF INFECTION

1. Healthcare Associated Infections:

All Health Boards and Trusts now have ICNet in place for IP&C case management and links to patient administration systems are in place across the Health Boards. The Enterprise MonitorModules for enhanced carbapenemase producing organism surveillance, outbreak surveillance, point prevalence survey module and the surgical site infection surveillance module are all progressing. **Health Boards and Trusts are required to use the ICNet system for local IP&C case management and outbreak management as well as the enhanced surveillance modules.** Optimising the use of the ICNet system will ensure the full benefits of the system are realised for the local IP&C teams and to allow improved classification of infections according to the location of onset (community vs hospital) and likely association with healthcare, which will in turn assist the NHS in Wales to focus their interventions appropriately.

The overarching ambitions for HCAI within the UK AMR Strategy are as follows:

- To reduce the incidence of a specified set of drug-resistant infections in humans in the UK by 10% by 2024/5.
- Halve the number of **Healthcare associated** Gram negative blood stream infections by 2024/5.

At the time of writing there is lack of clarity of the details underpinning these ambitions or how they will be monitored at UK level. The following **Improvement Goals for Wales** are set to deliver the first year of improvements needed to achieve the overarching ambitions by 2024/25.

1.1 Gram negative Blood Stream Infections (BSI):

Progress has been made during 2018/19 to reduce *E. coli* blood stream infections (BSI). The addition of *Klebsiella* and *Ps. aeruginosa* BSI data to the dashboards has allowed Health Boards and Trusts to gain a better understanding of the drivers for these infections.

**The Improvement Goal for Wales 2019-20:**

1. *E.coli* BSI: - the reduction expectation for all will be to achieve a *E.coli* BSI rate of 67 cases per 100,000.

2. *Klebsiella sp and Ps. aeruginosa* BSI: - to achieve a 10% reduction against 2017/18 figures. For those HBs that have achieved the 2018/19 target, these figures should at least be maintained in 2019/20 and they should work towards a 10% reduction against the 2018/19 baseline.

During 2019/20 the HARP team will start to produce an overarching Gram negative blood stream infection measure. Work will also progress towards providing breakdowns of hospital onset vs community onset infections and more information on HCAI vs Non-HCAI infections. This will be dependent on the availability of data from the PAS links in the ICNet system and additional information provided by local teams in the extended datasets (XPs).
During the year the HARP team will also work with the 4-nations UK Surveillance group to work on the drug resistant infection target – likely to be ready for setting from 2020/21.

1.2 C. difficile

The NHS in Wales as a whole has improved on its C. difficile case numbers during 2018-19, with 27% fewer cases seen. All Health Boards and Trust had fewer cases of C. difficile in 2018-19 when compared with 2017-18. Reducing the burden of C. difficile disease remains a priority for the NHS in Wales.

The Improvement Goal for Wales 2019-20:

Taking boundary changes into consideration the C. difficile improvement goal for 2019/20 will be:

1. All HBs to reduce to a rate of 25 cases per 100,000 population.
2. HBs that have achieved their 2018/19 reduction expectations should reduce their 2018/19 rate by a further 10% in 2019/20.

During 2019-20 the HARP team will work towards reporting C. difficile surveillance providing breakdowns of hospital onset vs community onset infections and more information on HCAI vs Non-HCAI infections. This will be dependent on the availability of data from the PAS links in the ICNet system and additional information provided by local teams in the XPs.

1.3 Staph. aureus bacteraemia

During 2018/19 MRSA bacteraemia rates reduced, but MSSA bacteraemia increased. It is acknowledged that there is a significant non-healthcare associated community burden of MSSA, but that there are key interventions and improvement programmes being undertaken within our Health Boards that should contribute to reducing the burden of this key infection.

The Improvement Goal for Wales 2019-20:

1. Overall Staph. aureus bacteraemia rates should be no more than 20 cases per 100,000 population with a clear focus on preventable or avoidable BSI
2. There will be zero tolerance of MRSA bacteraemia, with further reductions expected.

During the year the HARP team will work towards providing breakdowns of hospital onset vs community onset Staph. aureus bacteraemia infections and more information on HCAI vs Non-HCAI infections. This will be dependent on the availability of data from the PAS links in the ICNet system and additional information provided by local teams in the XPs.
2. Prevention, Control and Management of Infections:

In addition to reducing the burden of key infections, improvement is also required in the prevention, control and management of infections particularly in the community. This will contribute to reducing the burden of infection.

The Improvement Goal for Wales 2019-20:

Primary / Community:

1. To reduce the burden of infection and risks of blood stream infections derived from the community:
   - Implement evidence based interventions in the management of:
     - People who inject drugs (PWID)
     - Wound / chronic ulcer management
     - Prevention of respiratory infections
       - Oral Care
       - Immunisation against influenza
       - COPD management
   - Continue delivery of population level oral health programmes in dentistry (Designed to Smile) and dental services to increase delivery of evidence based prevention and ensure appropriate treatment of urgent dental cases
   - Roll out of Aseptic Non-Touch Technique (ANTT) in community settings
   - Early diagnosis of the infected patient in the community / out of hospital


2. To improve UTI prevention, diagnosis and appropriate management across the whole healthcare system utilising ‘UTI 9’ standards to include:
   - Improving hydration
   - Appropriate urine sampling and recognition of UTI
   - Improving the management and use of urinary catheters
   - Use of appropriate antimicrobial treatment

Secondary Care:

1. To embed the use of the Outbreak Surveillance Module of ICNet Enterprise Monitor into regular management of outbreaks.

2. To expand surgical site infection surveillance beyond orthopaedic elective hip and knee surgery and C-section surgery using the ICNet Enterprise Monitor SSI module. Colo-rectal SSI surveillance will be first pilot.

3. To participate in the national surveillance of carbapenemase Producing Organisms which will be implemented during 2019/20.
4. To improve UTI prevention, diagnosis and appropriate management across the whole healthcare system utilising 'UTI 9' standards to include:

- Improving hydration
- Appropriate urine sampling and recognition of UTI.
- Improving the management and use of urinary catheters
- Use of appropriate antimicrobial treatment.