

**PWYLLGOR ANSAWDD, DIOGELWCH A SICRHAU PROFIOD
QUALITY, SAFETY AND EXPERIENCE ASSURANCE COMMITTEE**

DYDDIAD Y CYFARFOD: DATE OF MEETING:	13 August 2020
TEITL YR ADRODDIAD: TITLE OF REPORT:	Critical Care Medicines - Update Position (Risk 848)
CYFARWYDDWR ARWEINIOL: LEAD DIRECTOR:	Jill Paterson Director of Primary Care, Community and Long Term Care
SWYDDOG ADRODD: REPORTING OFFICER:	Jenny Pugh-Jones Clinical Director of Pharmacy and Medicines Management

Pwrpas yr Adroddiad (dewiswch fel yn addas)

Purpose of the Report (select as appropriate)

Ar Gyfer Trafodaeth/For Discussion

**ADRODDIAD SCAA
SBAR REPORT**

Sefyllfa / Situation

The global nature of the COVID-19 pandemic, the expansion of critical care capacity and the treatment options for COVID-19 has put significant strain on the supply of certain medicines used in critical and end of life care in the UK.

A number of processes have been implemented through collaboration with all Health Boards/Trusts across NHS Wales, Welsh Government (WG) and Senior Pharmacy Leads, to mitigate the risks of unavailability, and to ensure that these medicines (and fluids) reach the patients most in need, adhering to the principles of mutual aid across Health Boards/Trusts.

With the move to recommence routine care within NHS Wales, it is recognised that there is a need to ensure that this does not impact negatively on the current fragile supply chains for critical care medicines and a balance is required to ensure the risks of a shortfall of these medicines is minimised, should a further increase in activity of COVID-19 occur putting patients at risk.

This paper provides an updated position for Hywel Dda University Health Board (HDdUHB) associated with:

- Critical Care Medicines including haemofiltration fluid;
- End of Life Medicines (EoL).

Currently HDdUHB has sufficient stock of these critical medicines to provide care for our patients; however, this position can change rapidly depending on demand and activity.

Cefndir / Background

Medicine shortages are routinely managed effectively within pharmacy procurement teams. This impacts significantly on pharmacy capacity due to the time taken to source from alternative suppliers and ensure supply of either the same or similar products for use in the hospitals.

Recent demands on a relatively small range of medicines that are used to treat COVID-19 and related symptoms has meant that the supply chains have been under significant pressure.

The NHS Wales COVID-19 Operating Framework recognises moves to recommence routine care within NHS Wales. A significant proportion of COVID-19 patients will require critical care and many will require invasive ventilation. WG are proposing guidance intended to support situations where medicines are in short supply specifically where the future course of COVID-19 is unknown and is aligned with the World Health Organisation's guidance on [Maintaining essential health services: operational guidance for the COVID-19 context](#). Part 1.8 of that guidance refers to maintaining the availability of essential medications, equipment and supplies. *In general, critical care medicines should only be used for routine care when stock levels are above the minimum level required to meet anticipated COVID-19 demand.*

Asesiad / Assessment

To ensure that the Health Board is confident of resuming routine work while maintaining a level of assurance that, if an outbreak occurred at short notice, the stocks of critical care medicines would be sufficient to provide the necessary care for our patients, a number of actions have been implemented, including safeguarding a level of stock and an early alert system when/if the supply chain comes under pressure. This will provide sufficient time for adjustments to be made for routine operations if necessary, to ensure the Health Board is prepared for a potential increase in activity and demand.

WG recommends that no organisation should assume any procedure which requires an anaesthetic, sedative, analgesic or neuromuscular blocking agent can go ahead without first ensuring either:

- The required medicines for use during and following the procedure are available and can, if necessary, be replenished;
- If the required medicines cannot be replenished, they can be safely substituted by alternative medicine which is of similar clinical efficacy and for which supply is less constrained; or
- Stocks of the required medicine are sufficient for use in other potentially more urgent situations including being readily available in case of increased demand from new cases of COVID-19.

HDdUHB is currently working on a peak COVID-19 demand of **20 ventilated patients** in Critical Care beds. On this basis, there will need to be enough critical care medication to support care for up to **20 patients for 4 days**. The stock level within the HB of the following groups of medicines is being monitored closely by Pharmacy:

- Neuromuscular blocking agents
- Sedation
- Vasopressors
- Opioids

Current stock will be monitored against the need to support 20 ventilated beds for 4 days and compared to the *average 10 day usage during 2019*. If stock levels of one or more of the above groups fall below this predetermined level, the Acute Bronze Group will be informed in order that a clinical decision can be made on the action that should be taken with regards to upcoming planned care, following the suggested decision making framework below:

Stock level > Critical Care functional capacity*	Supply chain active	Supplies above the estimated COVID requirement should be made available for routine care
Stock level at functional capacity*	Supply chain active	Supplies above the estimated COVID requirement should be made available for routine care
Stock below functional capacity*	Supply chain active	Medicines stock should be allocated to support routine care and replenished. Where stock cannot be fully replenished, use where medicine is needed to support priority procedure types/lists
Stock level at functional capacity*	Supply chain issue with 1 or more group(s) of medicines	Medicines stock should be allocated to support routine care and replenished. Where stock cannot be fully replenished, use where the medicine is needed to support priority procedure type/lists
Stock below functional capacity*	Supply chain issue with 1 or more group(s) of medicines	Supplies should be allocated to support routine care on a patient by patient basis and where it is determined there is an immediate need for the medicine and no clinically suitable alternative is appropriate or available.

The process for escalating issues with stock will be as follows:

- If stock/supply chain issues signal Amber or Red as above, the situation will be highlighted to the Acute Bronze Group at their weekly meetings.
- If urgent issue arises any other day of the week it should be escalated to the acute site General Managers for immediate action.

Further Mitigation

To reduce the risk of disruptions to the supply chain of these medicines in the case of a further outbreak of COVID-19, a number of additional actions continue to be implemented to mitigate the risks, as follows:

- All Health Boards/Trusts in Wales have agreed this process for access to medicines.
- A number of actions to conserve existing stocks e.g. vial sharing.
- National activity to set up temporary aseptic production unit to produce ready to use pre-filled syringes from bulk products.
- Working with lead clinicians to pre-empt changes to practice where certain medicines are unavailable, sourcing alternatives where possible, based on the Guidance issued by the Royal College of Anaesthetists.

Haemofiltration Fluids

Current stocks across Wales remain good and close working with the relevant companies indicates that the pressures seen at the beginning of the outbreak have reduced.

Actions taken to reduce the risk of further shortages being identified at very short notice include:

- In line with principles of mutual aid across organisations in Wales, Health Boards have agreed to share current stock levels to ensure access for patients when needed within Wales.
- The renal network has developed guidance on use of Baxter products for patient receiving Fresenius Kabi (FK) products to support increased resilience.
- Work with clinicians to provide guidance on treatment goals to conserve fluids.
- Exploring alternatives in urgent cases such as possible use of dialysis machines.

End of Life (EoL) Medicines

Through collaboration with the military, pharmacy and NHS Couriers with WG support, a system has been implemented that ensures that any patient, anywhere in Wales, has access to EoL medicines within 2 hours of the clinician making the decision of need. This is being managed through six hubs across Wales including Bronllais General Hospital (BGH) and Glangwili General Hospital (GGH) through the provision of a **Just in time Emergency Medicines Pack (JEMP)**. The use of a centralised hub has maintained the supply chain more effectively and ensured visibility of stock, allowing movement if required from one hub to another to meet patient need.

In addition, Welsh Ambulance Service NHS Trust (WAST) ambulances have carried an increase level and variety of EoL medicines that they have used effectively during recent months. It is likely that this will remain as standard stock in the future following a review of activity and need.

The number of Community Pharmacies that stock a wider range of EoL medicines has increased from 9 to 14 providing accessible cover for the geographical region of HDdUHB. This has made it easier to locate and reduce the time spent by patient's families and district nursing teams accessing these medicines.

The JEMP service is currently under review as there remains pressures on the system with the need for the six hubs and NHS couriers to be available 24/7 when the demand is currently low. It may be necessary to step the service down in the near future, with an option to re-instate at short notice should the need arise.

These actions have ensured that the supply chain has remained intact and while there have been shortages these have been managed proactively with suitable alternatives being made available.

Risks

The mitigating actions for critical medicines put in place, and those remaining in place, together with reduced concerns of the supply chain has led to a reduction in the current risk score. If further alerts arise identifying shortages of critical medicines, alongside increased activity, then this will be reviewed accordingly.

The revised risk score (848) has been reduced from 20 to 12 and now, following further review to 8, as follows:

This risk is avoidable harm to patients due to potential unavailability of critical care medicines including haemofiltration fluids.

Likelihood 2 Consequence 4 **Risk Score 8**

Argymhelliad / Recommendation

For QSEAC to note the updated position for HDdUHB and support the actions taken to mitigate the shortages of critical care medicines.

Amcanion: (rhaid cwblhau) Objectives: (must be completed)	
Committee ToR Reference: Cyfeirnod Cylch Gorchwyl y Pwyllgor:	5.8 Provide assurance to the Board that current and emerging clinical risks are identified and robust management plans are in place and any learning from concerns is applied to these risks as part of this management.
Cyfeirnod Cofrestr Risg Datix a Sgôr Cyfredol: Datix Risk Register Reference and Score:	Preventable death of a patient due to unavailability of critical medicines (including haemofiltration) Risk register score 8 RR no. 848
Safon(au) Gofal ac Iechyd: Health and Care Standard(s):	2.1 Managing Risk and Promoting Health and Safety 2.6 Medicines Management 3.1 Safe and Clinically Effective Care

Effaith/Impact:	
Ariannol / Financial: Ansawdd / Patient Care: Gweithlu / Workforce: Risg / Risk: Cyfreithiol / Legal: Enw Da / Reputational: Gyfrinachedd / Privacy: Cydraddoldeb / Equality:	N/A