Bwrdd Iechyd Prifysgol Hywel Dda University Health Board

CYFARFOD BWRDD PRIFYSGOL IECHYD
UNIVERSITY HEALTH BOARD MEETING

DYDDIAD Y CYFARFOD: **DATE OF MEETING:**	29 September 2022
TEITL YR ADRODDIAD: **TITLE OF REPORT:**	Closure Report on Making Malnutrition Matter Business Case
CYFARWYDDWR ARWEINIOL: **LEAD DIRECTOR:**	Alison Shakeshaft, Executive Director of Therapies & Health Science
SWYDDOG ADRODD: **REPORTING OFFICER:**	Karen Thomas, Joint Head of Dietetics

Pwrpas yr Adroddiad (dewiswch fel yn addas) **Purpose of the Report** (select as appropriate)
Er Sicrwydd/For Assurance

ADRODDIAD SCAA
SBAR REPORT

Sefyllfa / Situation

This report aims to provide assurance to the Board on progress against Planning Objective (PO) 5L: Making Malnutrition Matter' which was closed as completed by the Executive Team in February 2022, through the review of planning objectives for the 2022/23 planning cycle. The report highlights key progress milestones and outcomes to date; and summarises ongoing work to embed Making Malnutrition Matter into business as usual and realise the full benefits.

Although some aspects were delayed by the COVID-19 pandemic, significant progress has been achieved with delivery of the approved business case, which has resulted in the two associated extreme clinical risks being closed.

There has been progress against key delivery milestones which support the strategic approach to malnutrition, including development of a self-screening tool, integration into frailty, falls and front door pathways, and initiation of work to upstream identification and management of malnutrition risk, working collaboratively with a range of community partners.

There is a focussed malnutrition delivery plan and an evolving outcome and impact evaluation framework, to enable the value to be captured and reported as work continues to embed Making Malnutrition Matter across systems.

Cefndir / Background

The Health Board supported the Making Malnutrition Matter business case in September 2019. At that time the risk of malnutrition, with its associated direct & indirect consequences on patient outcomes and healthcare utilisation, was identified as a significant patient safety issue for the Health Board, with two associated extreme risks.

This was largely due to the Nutrition & Dietetic Service being unable to respond to the number of patients referred with a high malnutrition risk in hospital and in the community, resulting in a significant risk of serious harm secondary to malnutrition.

The extreme risk to hospital inpatients was compounded by the inability to provide consistently robust nutritional care at ward level due to limitations around ward staffing numbers, nutritional knowledge and skills, and high patient acuity.

In the community there was evidence of significant unidentified malnutrition, particularly in the older population. There were long delays in dietetic response to those with identified high malnutrition risk, which evidence states adversely impacts on wellbeing and leads to increased escalation and demand on healthcare, particularly in secondary care.

The Making Malnutrition Matter Business Case (2019) recommended a whole-system, strategic approach to tackling malnutrition across the Health Board, with an initial objective to increase acute and community dietetic staffing and reduce the risks associated with malnutrition.

Since approval of the Business Case, there has been an incremental increase in dietetic staffing firstly in acute and then community services over a three year period. Recruitment concluded with appointment of the Malnutrition Strategy Lead in September 2021; however, there is an ongoing rolling vacancy factor of between 15% and 25% due to challenges with recruitment.

The Nutrition Champion model was designed as a framework to support a sustainable improvement in ward based nutritional care. The aim being to improve outcomes by optimising the nutrition and hydration care of in-patients through enhancing the knowledge and skills of named ward team registered nurses and health care support workers alongside embedding the use of quality improvement methodology. COVID-19 significantly delayed progress with delivery of the Nutrition Champion model and up-stream work in the community.

With support from the Value Based Healthcare team, work continues on developing a system wide evaluation framework to demonstrate the full value and impact of the wide range of malnutrition related work. Currently, reporting is through the Nutrition and Hydration Group, which exception reports to the Operational Quality, Safety and Experience Sub Committee.

Asesiad / Assessment

In April 2022, the two previously extreme malnutrition related risks: Risk 654 (A risk of harm to in-patients identified as at high risk of or at malnutrition) and Risk 658 (A risk of poor outcomes for elderly and frail patients with malnutrition or high malnutrition risk in the community) were closed, on the basis of demonstrating consistently improved dietetic response times to patients referred at high risk of malnutrition.

There are, however, two recently submitted risks, overseen by the Nutrition and Hydration Group, in relation to the system wide management of malnutrition; these are unrelated to dietetic capacity:

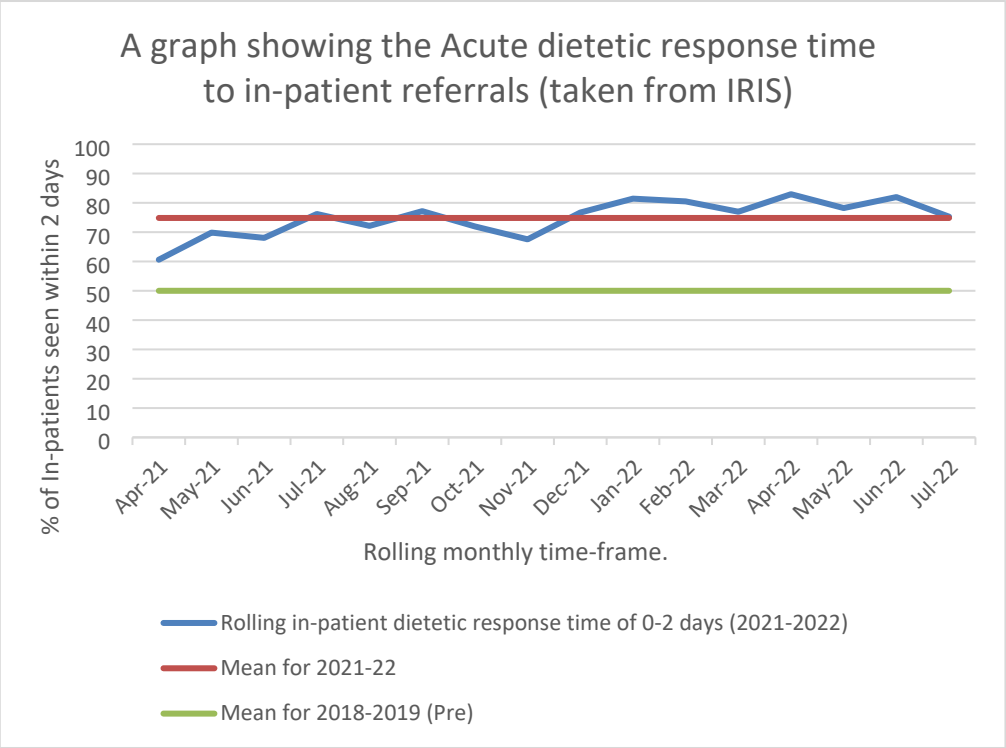
- Risk 1391 (A risk of harm from malnutrition to inpatients due to nurse-staffing capacity and COVID-19 related delays in the roll-out of the Nutrition Champion model) with a mitigated score of 12.
- Risk 1372 (A risk of poor outcomes for elderly and frail patients with malnutrition or high malnutrition risk in the community). COVID-19 has exacerbated this risk due to unidentified malnutrition risk because of people not presenting to healthcare during the pandemic. Mitigated score of 9.

There are action plans in place to reduce these risks.

Improved Dietetic Response Times

There has been sustained improvement in acute dietetic response time from 50% of in-patients seen within 2 days and an average response time of 11.5 days in 2019, improving to >75% within 2 days, and >60% within 1 day. 13% patients wait 3 to 5 days, and 10% up to 10 days. The slower response times occur when there is reduced team capacity due to vacancy or periods of leave. Response time includes weekend days however dietetics operate over 5 days. For context there are on average 970 acute patient contacts per month, of which 210 are new patients (this excludes post discharge and out-patient clinic activity also undertaken by the acute dietetic team).

Fig 1: Acute Dietetic response time to in-patient referrals (taken from IRIS)

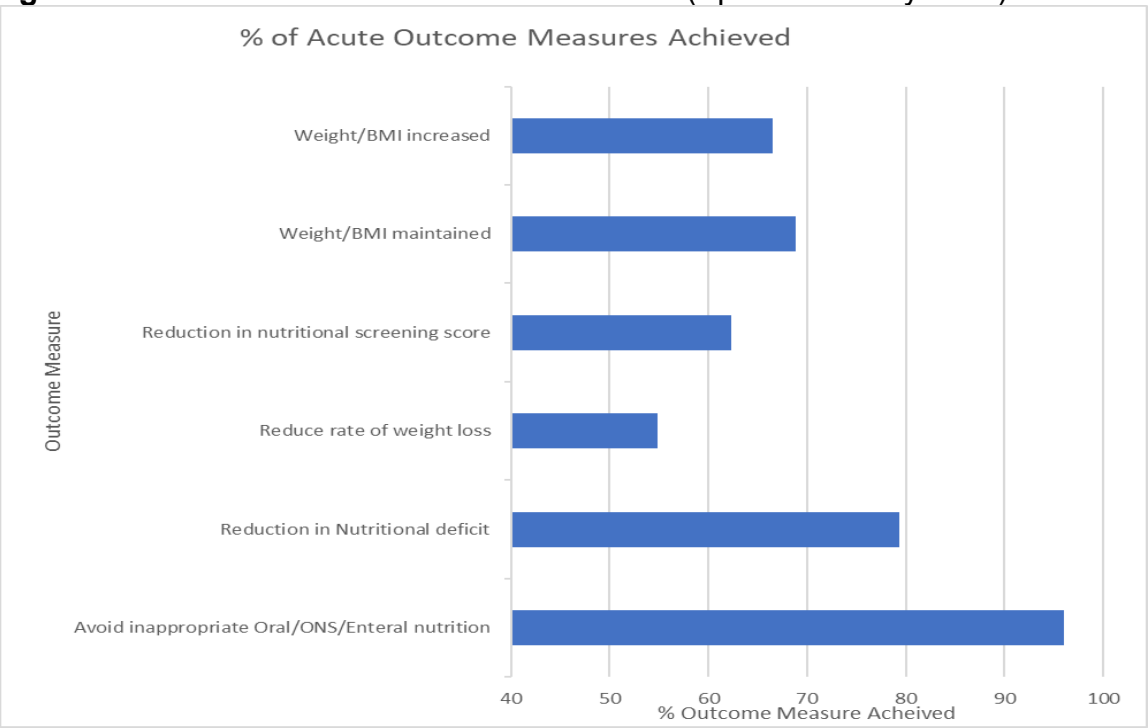


The Nutrition Champion model is designed to support patients at moderate risk to reduce escalation of nutritional risk, and to pro-actively support less nutritionally complex patients who may wait longer than 2 days for dietetic input. This model is designed to build a sustainable, optimised ward-based approach to nutritional care.

By responding more rapidly in-patients are now very unlikely to be experiencing prolonged hospital admission, re-admission, or harm secondary to the impact of malnutrition.
The dietetic team use an operational outcomes framework embedded in WPAS with reporting via IRIS to capture and report the outcomes of dietetic intervention.

Fig 2 shows a summary of some of the key acute dietetic patient outcome measures for the period of April 2021-July 2022. These nutrition related outcomes will impact the key determinants of patient well-being recovery, functional maintenance, length of stay and risk of re-admission.

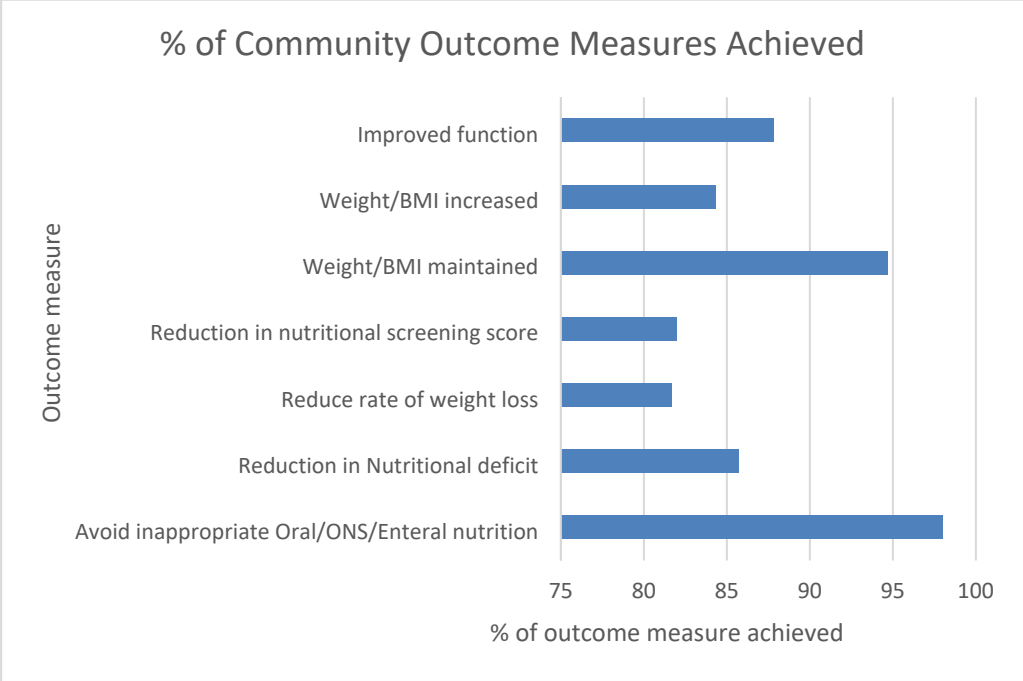
Fig 2: % of Acute Outcome Measures Achieved – (April 2021 - July 2022)



There has been sustained improvement in response times by Community Dietetics: from an average response of 7 weeks in 2019, to 70% of referred patients responded to within 4 weeks, and 50% within 1 week. 30% of community patients are waiting longer than 4 weeks largely due to vacancies in the community team reducing capacity, and an increased complexity of presenting patients, noted post-pandemic, who then require longer periods of dietetic intervention. All patient referrals are triaged to target those with the most urgent and complex needs, and where appropriate first line risk mitigating information is provided pending dietetic assessment.

Fig 3 shows a summary of some key community dietetic patient outcomes for the period of April 2021-July 2022. These nutrition related outcomes impact the key determinants of patient well-being & recovery, functional maintenance, and risk of re-admission.

Fig 3: % of Community Outcome Measures Achieved – (April 2021 - July 2022)



The improved response times by both acute and community dietetics is against a backdrop of the significant impact of COVID-19 on service delivery, and a subsequent marked increase in the complexity and acuity of patient nutritional presentation and nutritional support required, in both secondary and community care. Dietetics is a 5- day service and the respective acute and community dietetic teams are operating with between 15 and 25% vacancy rates largely due to challenges with recruitment.

As part of the on-going roll out of self-screening and self-referral, the community team are moving towards a new rapid response, intervention, and discharge model. Traditionally patients accessed the service via referral from a health or care professional and some patients with complex needs remained on active caseloads for significant periods of time due to ongoing requirement for monitoring of nutritional support. The new model includes the use of patient initiated follow up, a more defined active intervention period with the aim of releasing capacity to see new patients sooner.

Implementation of the Nutrition & Hydration Champions' model
The roll out of the Nutrition Champion model started late 2019 but progress was halted by COVID-19. Roll out has been re-established; however, operational challenges with ward nurse staffing capacity remains a risk to achieving the full impact of this model as identified above. The worked example below (undertaken pre-COVID 19) illustrates the achievable patient and organisational / cost benefit that can be expected.

Outcomes from ward-based Nutrition Improvement Champion model (captured pre-COVID-19)
Nutrition and hydration improvement work undertaken with rehabilitation support workers on Ystwyth ward (whole ward approach), Bronglais Hospital, demonstrates the achievable patient and extrapolated cost impact.

Fig 4: shows a significant reduction in the incidence of dehydration. An episode of dehydration in hospital results in a 12-to-24-hour hospital stay at a cost of £698 /24hours (based on medical speciality bed): £2,800 reduction in 1 week on 1 ward.

Fig 4: Incidence of dehydration pre and post implementation of a fortified milkshake round

Fig 4

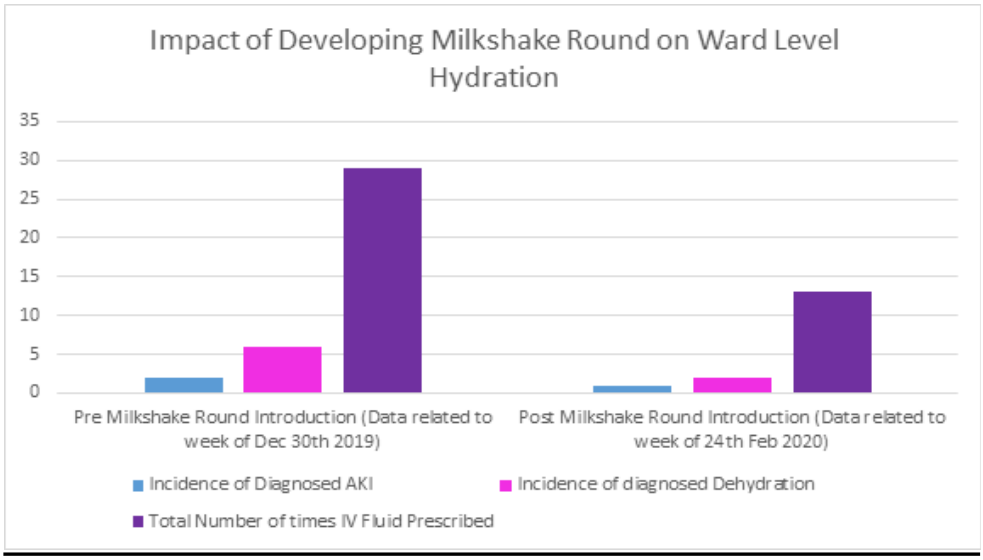


Fig 5: shows a significant reduction in the need for Intra-venous fluids. 1 litre basic IV saline is £1.07: 100 less IV fluids reduced cost by £107 in 1 month on 1 ward (excluding associated prescribing and nursing time, and cannulas required).

Fig 5: Number of Intravenous (IV) Fluids used pre and post implementation of nutrition improvement

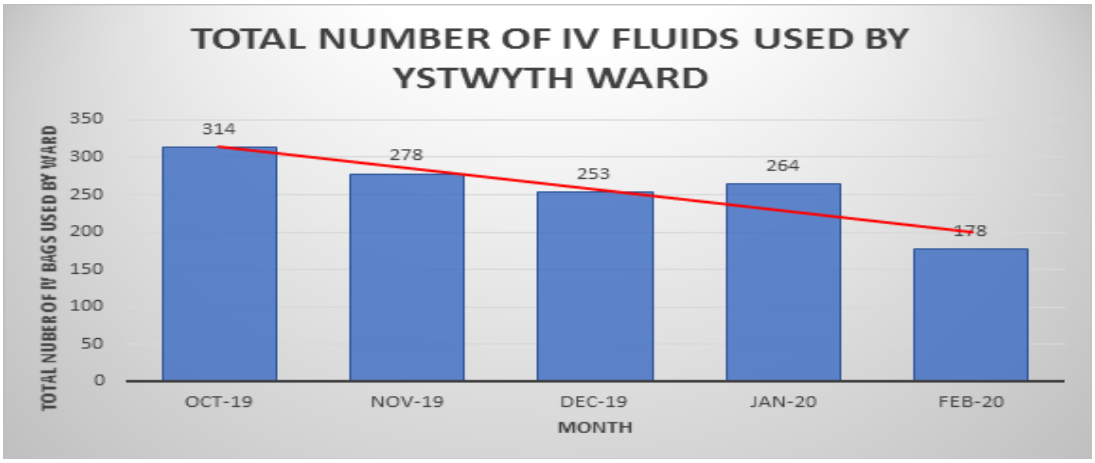


Fig 6: shows a reduction in the number of patients requiring prescribed nutritional support or enteral tube feeding. Supplementary tube feeding typically impacts on length of stay (as an indication of patient complexity) at a cost of £698 / 24hours.
Avoiding the need for 2 patients to be tube fed or enabling sooner step down from reliance on tube feeding on 1 ward in 1 month, based on estimated minimal 2-day increased length of stay, reduced cost by £2,800.

Reducing the need for oral prescribed supplements in hospital results in reduced requirement post discharge. Typical prescription for oral nutritional supplements in the community costs £4.50 / patient / day. Reducing ONS need for 4 patients post discharge from 1 ward in 1 month reduces associated prescribing costs by £540 / month.

Fig 6: De-escalation of malnutrition risk and number of patients requiring clinically assisted nutrition pre and post implementation of nutrition improvement

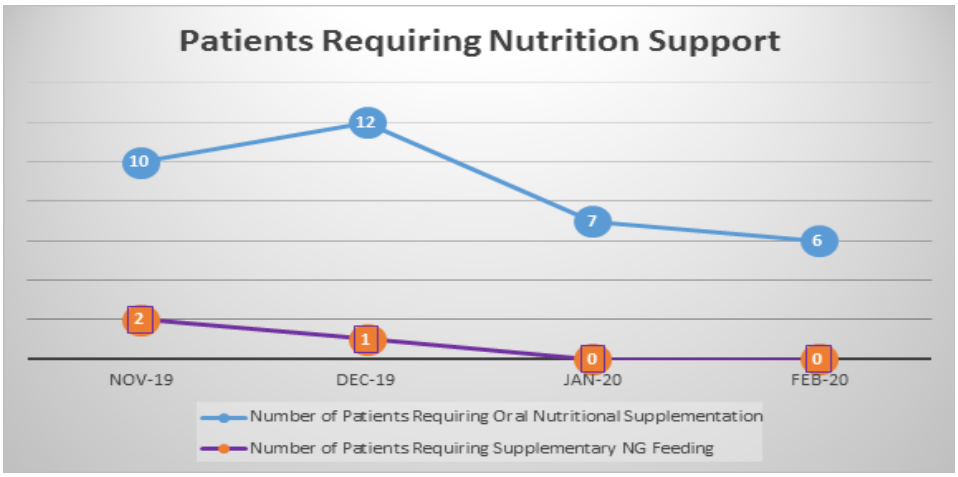


Fig 7: illustrates the improved weight trajectory of patients achieved through enhanced nutritional intake using fortified milkshakes. Weight maintenance and gain indicate managed nutritional risk and is a key determinant in patients' functional maintenance although mobility to support muscle function is also essential to realising the full benefits.

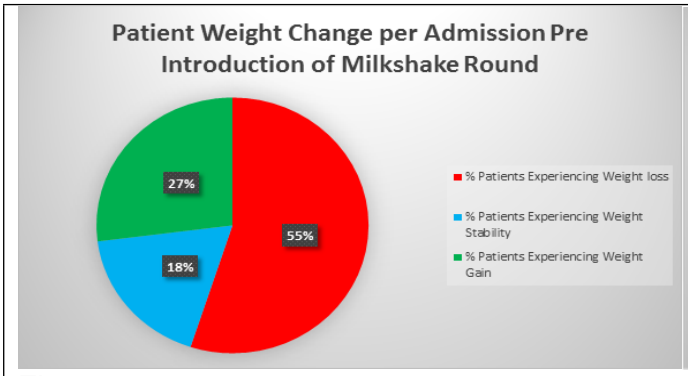


Fig 7a

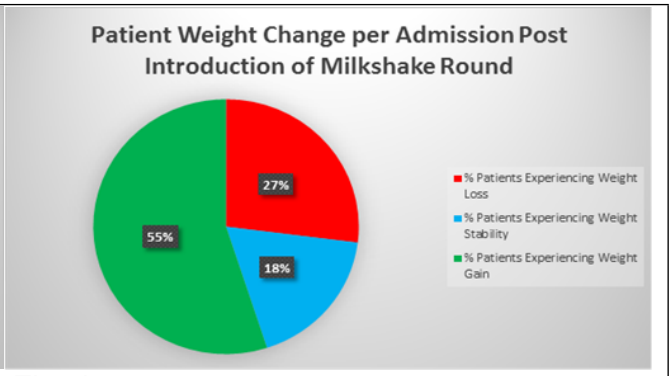


Fig 7b

Front of House, Frailty & Falls

For patients presenting at hospital, early identification and management of nutritional risk can improve patient outcomes and reduce subsequent healthcare utilisation. The integration of nutrition and hydration action for improvement aligns with the Welsh Government Six Goals for Urgent and Emergency Care, 2021. Additionally, there will be support towards attaining and maintaining the 'All Wales Dementia pathway' work towards the 'Hospital Charter- Improving Nutrition & Hydration for people living with Dementia in an acute hospital'.

For this reason, targeting nutritional intervention at the front door: Accident and Emergency Units (A&E), Clinical Decision Units (CDU) and Same Day Emergency Care (SDEC), offers two significant opportunities:

- Early identification of nutritional risk enabling timely intervention, and
- Targeted intervention and support for community patients identified at risk who can be 'turned around at the front door', preventing further escalation and re-presentation.

Snapshot data collected in Glangwili Hospital A&E during December 2021, indicated that of a cohort of patients waiting >24 hours in A&E: 50% were at risk of malnutrition, of which 39% benefitted from rapid access to dietetic support. Notably 10% of patients needed actual assistance with eating and drinking.

Additionally, working in partnership with the Quality Improvement Practitioner, a mapping in May and June 2022 of facilities for and access to fluids for people waiting at the front door has been undertaken and initial gaps in provision addressed, supporting improved access to hydration for patients waiting at the front door (and staff), with the aim of reducing the risk and harms from dehydration and improving patient experience.

Work continues to integrate nutrition and hydration into front door, frailty and falls multi-disciplinary team processes and pathways across the Health Board:

- Dietetic Assistant Practitioner periodically attending A&E & CDU to help identify patients who have been in for >24hrs, assisting with screening and initiating early action for those at high risk.
- Patients screened at risk and turned around at the front door are rapidly referred for community dietetic support.
- Dietetics are part of establishing frailty teams focussing on the front door and same day emergency care models.

Screening for malnutrition

A locally developed self-screening tool for malnutrition has been developed. The aim is to support people to prevent, identify sooner, self-manage, and de-escalate their risk of malnutrition with rapid access to dietetic support when required.

This will empower older and nutritionally vulnerable people, their families, carers and proximal community to take earlier action on malnutrition and poor hydration by embedding malnutrition and poor hydration risk factors into prevention and health improvement programmes. Reaching people upstream is the key to realising the greatest impact described in the original business case, reducing associated health and care utilisation.

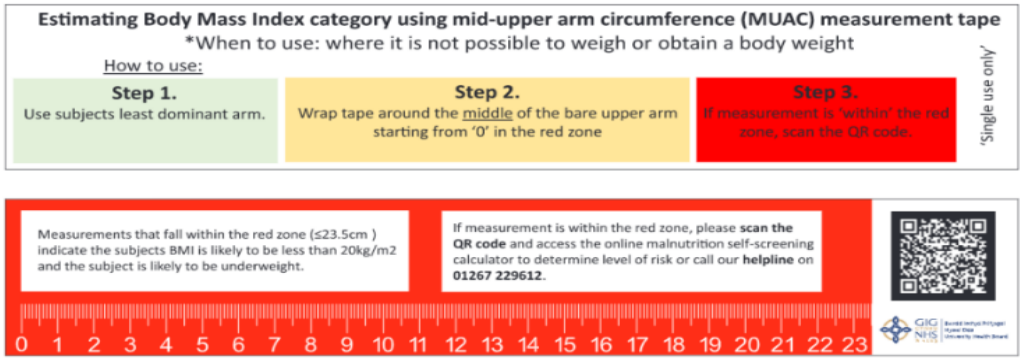
The tool was initially introduced, via a QR code, in the A&E unit at Glangwili Hospital and is now incrementally rolling out into the community with an initial focus on Pembrokeshire. It has recently been integrated into gastroenterology out-patient appointment letters (noting this patient group are at greater risk of malnutrition) and there are early plans to make it accessible via community pharmacy.

[Home - Hywel Dda Health Board (selfscreeningforundernutrition.org)]

To further increase the reach of screening for malnutrition risk by healthcare teams in the community an upper arm circumference band (Fig 8) has been developed locally; this is a quick to use tool, intended for use when weighing isn't possible.

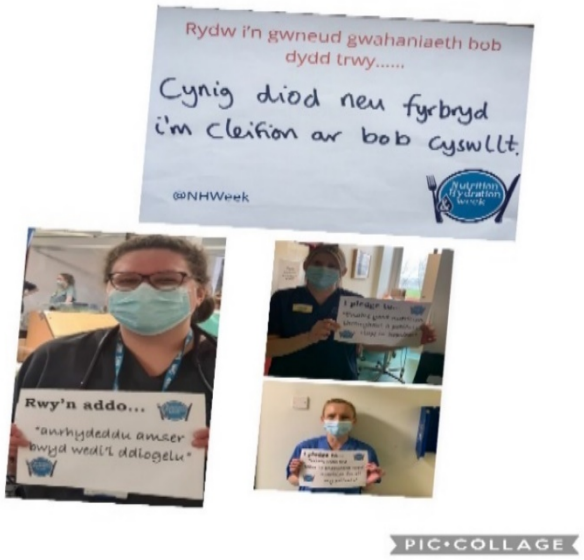
Fig 8

The Health Board led the way in screening for malnutrition during UK Malnutrition Awareness Week in October 2021 and were awarded the Top Screener in Wales by the British Association of Parental and Enteral Nutrition.
This annual UK-wide survey will be an on-going priority because screening is a vital step in identifying people at risk of malnutrition to enable targeted action across the system.



The evolving Community Dietetic team service delivery model aims to ensure a timely response to referrals from profession-led to self-referral, which continues to be a key quality improvement workstream for 2022-23.

During Nutrition and Hydration Week, March 2022 the Health Board developed bilingual Malnutrition Pledge Cards which were used across NHS Wales. The aim being to reinforce nutrition as 'everyone's business'.



Food First to reduce oral nutritional supplement prescribing

The cost of prescribed oral nutritional supplements (ONS) in the Health Board has increased, largely due to the need to rapidly implement emergency ONS prescribing pathways during the COVID-19 pandemic.

The associated cost increased by 6.93% from £1,409,223 (May 20 – April 21) to £1,506,932 (May 21 – April 22).

Plans are in place to reverse the increased spend through introduction of a new formulary of best value ONS, script swaps and the implementation of a Food First approach. Familiar foods and drinks are more palatable and generally better complied with by patients than prescribed oral supplements (October 2021 'PrescQipp' NHS Wales Bulletin).

Simple homemade supplements that are cheap to make and nutritionally comparable to prescribed ONS will be used as first line prior to access to prescribed. The roll-out of this will be sensitive to the predicted 'winter fuel & food' pressures for vulnerable groups.

As well as delivering prescribing cost reductions, there will be wider 'system value' realised including reduced prescribing time for Health Care Professionals in Primary Care. This work is being supported by the Health Board's Value Based Healthcare Team.

Working 'Upstream' with Statutory Services, Voluntary & Third Sector groups to prevent and de-escalate Malnutrition risk

Coming out of the COVID-19 pandemic, there has been active engagement with statutory, third and voluntary partners, initially in Pembrokeshire, to raise awareness of malnutrition and its prudent management and integrate self-screening into resources and information available to older people and carers. This partnership working will underpin the ongoing plans to embed making malnutrition matter into the community recognising that reducing the Person and Organisational impact of malnutrition is determined by community action.

An NHS Charities grant secured in August 2022, in partnership with the Dyfed Drug and Alcohol Service (DDAS), will deliver a 'Nutrition Skills for Life - Train the Trainer' programme for DDAS staff, aligned to building knowledge and skills in the community for a sustained impact, with a focus on vulnerable groups. The outcomes of this project will be measured and reported alongside the Malnutrition work.

This assessment aims to demonstrate the whole-system approach to tackling malnutrition across the Health Board.

Argymhelliad / Recommendation

The Board is asked to take assurance from the report in relation to progress against the objectives in the Making Malnutrition Matter Business Case.

Amcanion: (rhaid cwblhau) Objectives: (must be completed)	
Cyfeirnod Cofrestr Risg Datix a Sgôr Cyfredol: Datix Risk Register Reference and Score:	Risk 1391: There is a risk of harm from malnutrition to inpatients due to nurse-staffing capacity and covid-related delays in the roll-out of the Nutrition Champion model. Mitigated Score 12 Risk 1372: There is a risk of poor outcomes for elderly and frail patients with malnutrition or high malnutrition risk in the community. Mitigated Score 9
Safon(au) Gofal ac Iechyd: Health and Care Standard(s):	2.5 Nutrition and Hydration 2.1 Managing Risk and Promoting Health and Safety 1. Staying Healthy
Amcanion Strategol y BIP: UHB Strategic Objectives:	4. The best health and wellbeing for our individuals, families and communities All Strategic Objectives are applicable
Amcanion Cynllunio Planning Objectives	4N Food System 4O Food and health literacy pilot 3A Improving Together
Amcanion Llesiant BIP: UHB Well-being Objectives: Hyperlink to HDdUHB Well-being Objectives Annual Report 2018-2019	4. Improve Population Health through prevention and early intervention, supporting people to live happy and healthy lives 8. Transform our communities through collaboration with people, communities and partners

	2. Develop a skilled and flexible workforce to meet the changing needs of the modern NHS

Gwybodaeth Ychwanegol: Further Information:	
Ar sail tystiolaeth: Evidence Base:	NICE CG 32: Nutrition Support in Adults Guidelines for the appropriate prescribing of oral nutritional supplements (ONS) for adults in primary care. PrescQipp & NHS Wales Bulletin 261i. October 2021 accessed on 02/08/2022 from index (prescqipp.info)
Rhestr Termau: Glossary of Terms:	WPAS: Welsh Patient Administration System ONS: oral nutritional supplements (prescribed) NG: nasogastic (feeding tube)
Partïon / Pwyllgorau â ymgynhorwyd ymlaen llaw y Cyfarfod Bwrdd Iechyd Prifysgol: Parties / Committees consulted prior to University Health Board:	Not applicable

Effaith: (rhaid cwblhau) Impact: (must be completed)	
Ariannol / Gwerth am Arian: Financial / Service:	Contained within the body of the report.
Ansawdd / Gofal Claf: Quality / Patient Care:	The report provides evidence of improved quality and a positive impact on patient care.
Gweithlu: Workforce:	Not applicable.
Risg: Risk:	Contained within the body of the report.
Cyfreithiol: Legal:	Not applicable.
Enw Da: Reputational:	Not applicable.
Gyfrinachedd: Privacy:	Not applicable.
Cydraddoldeb: Equality:	Contained within the body of the report.