Meeting Date	**28 November 2023**	**Agenda Item**	**4.1**
Report Title	**Re admission data pre and post Acute Medicine Service Redesign (AMSR)**		
Report Author	Dr Raj Krishnan, Acting Medical Director		
Report Sponsor	Dr Raj Krishnan, Acting Medical Director		
Presented by	Dr Raj Krishnan, Acting Medical Director		
Freedom of Information	Open		
Purpose of the Report	The paper reviews the number of re-admissions before and after the implementation of the AMSR programme.		
Key Issues	The AMSR project involved patients seen at one acute site. As part of the redesign, inpatient wards were relocated and new services were developed to support this move. The paper explores the impact the service re-design had on readmissions and mortality. The report outlines the different metrics measured, the limitations of the current data set and how readmissions should be monitored within the Health Board.		

Specific Action Required ***(please choose one only)***	**Information**	**Discussion**	**Assurance**	**Approval**
	☒	☐	☒	☐

Recommendations

Members are asked to **note** the report and **approve** the following action points and outcomes:

a) 30 – day unplanned readmission data need to be captured on the Business Intelligence system. This should be applied for patients admitted via both the elective and emergency pathways. Planned reviews or re-admissions (SDEC/AEC with separate DAL created) should be excluded from the total readmissions.

b) Readmission data should be monitored by the Service Groups at the Quality and Safety

'This document contains elements which do not comply with accessibility regulations'

		meetings and improvement plans must be developed in response to any variance.

Re admission data pre and post Acute Medicine Service Redesign (AMSR)

1. INTRODUCTION

AMSR (Acute Medicine Services Redesign) at Swansea Bay UHB was implemented in December 2022, when Medicine and its specialties moved from Singleton to Morriston unit along with the acute take for General Medicine. AMSR was implemented to help improve care of patients who needs admission for an acute condition. As part of the AMSR, services and wards were redesigned to improve patient flow.

2. BACKGROUND

Readmission rates within 30 days of discharge is used as a quality indicator and a focus for improvement. Readmissions are undesirable for patients, and they can burden the already resource-stretched NHS organisations. More importantly, readmissions have also been shown to be associated with the quality of care provided to patients at several stages along the clinical pathway including during initial hospital stays, transitional care services and the post-discharge support. Readmission rates are calculated as the number of unplanned admissions to the number of readmissions within 30 days of discharge and it is usually around 15% of all discharges with higher rates seen in patients with chronic conditions.

3. GOVERNANCE AND RISK ISSUES

The purpose of this paper is to identify the potential impact on readmissions in General Medicine after the implementation of the AMSR programme. To understand this, all inpatient and day case discharges within the first 30 days of the original discharge date were reviewed. This was undertaken for Morriston and Singleton between 1st April 2022 and 31st December 2022, and from 1st January to 30th June 2023 for Morriston. This will cover the period before and after the implementation of AMSR. Patients seen back in the Same Day Emergency care and Ambulatory Emergency Care were excluded.

a) Readmissions within 30 days post discharge for Morriston and Singleton April – Dec 2022 (pre-AMSR)

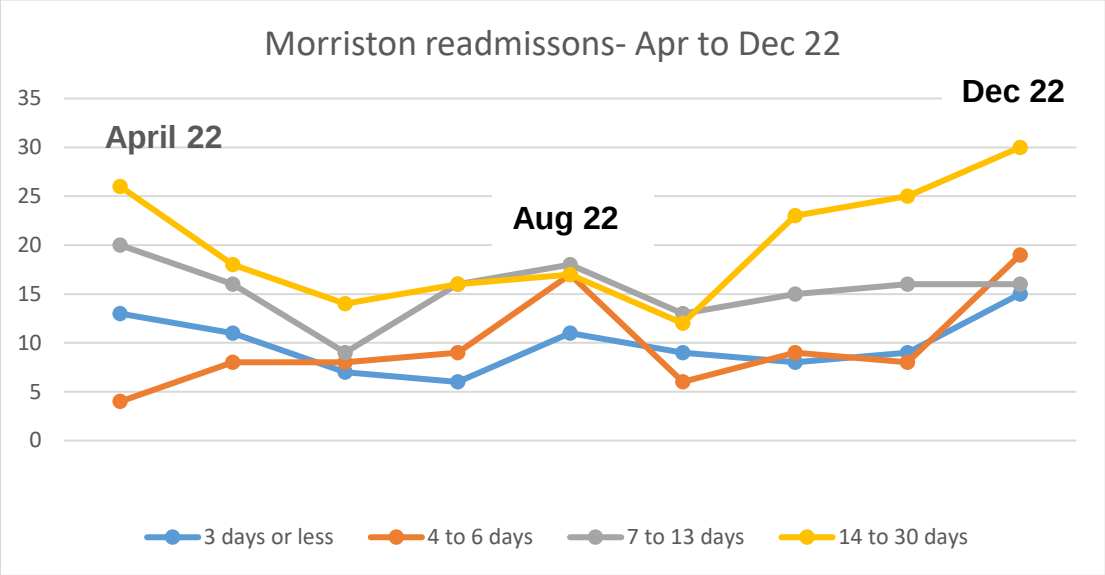

Figure 1

Over the nine month period in 2022, pre AMSR, Morriston was noted to have 497 re-admissions mainly occurring between 14 and 30 days of discharge. This does reflect true inpatient readmissions rather than a planned review in Ambulatory Emergency care (AEC) as this would have happened in the first few days after discharge. The data (Figure 1) reviewed demonstrates that April and December 2022 had higher number of readmissions with the highest numbers in the 70-79 year old cohort.

During this period, majority of the readmissions came from ward D (Acute Medicine at the time), followed by Rapid Assessment unit (Frailty unit/Care of the Elderly), followed by ward J (Respiratory ward). The number of patients admitted with the same diagnosis for Morriston during this period was 102 of the 497 readmissions (Figure 2).

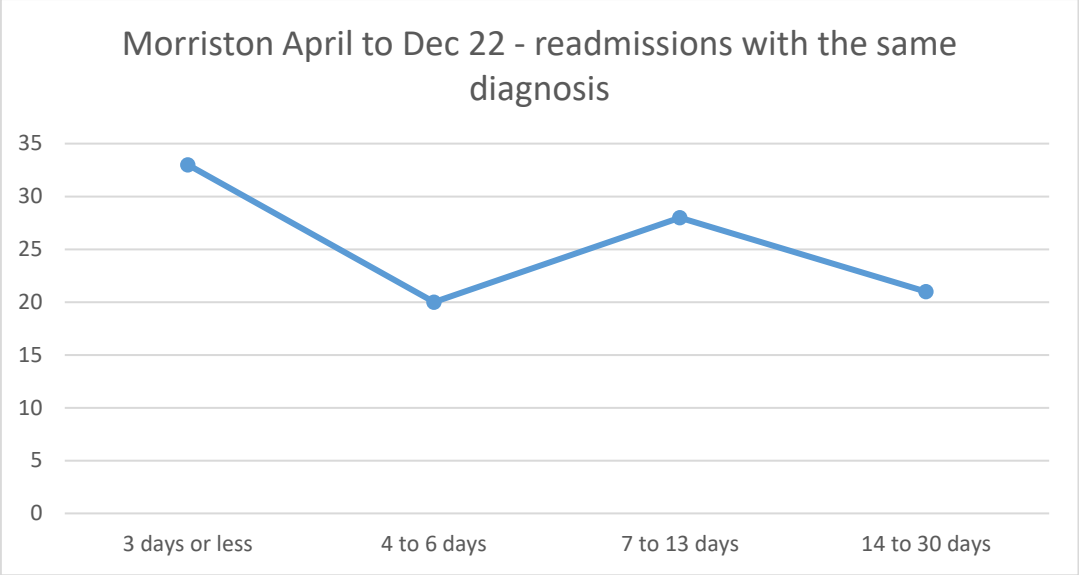

Figure 2

During the same nine-month period (Figure 3), Singleton had 422 readmissions. Out of these 422, 131 readmissions happened within the first 3 days post discharge.

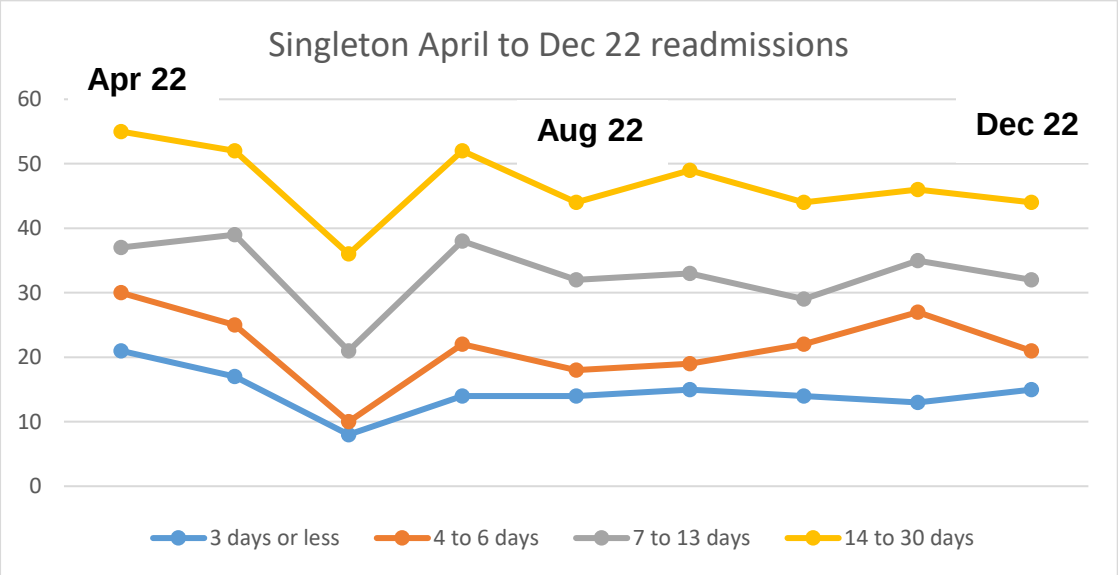

Figure 3

The number of patients who were readmitted to Singleton over the same period with the same diagnosis was 122 of the 420 readmissions (Figure 4); majority of these were during the first few days of discharge. The below graph demonstrates the same.

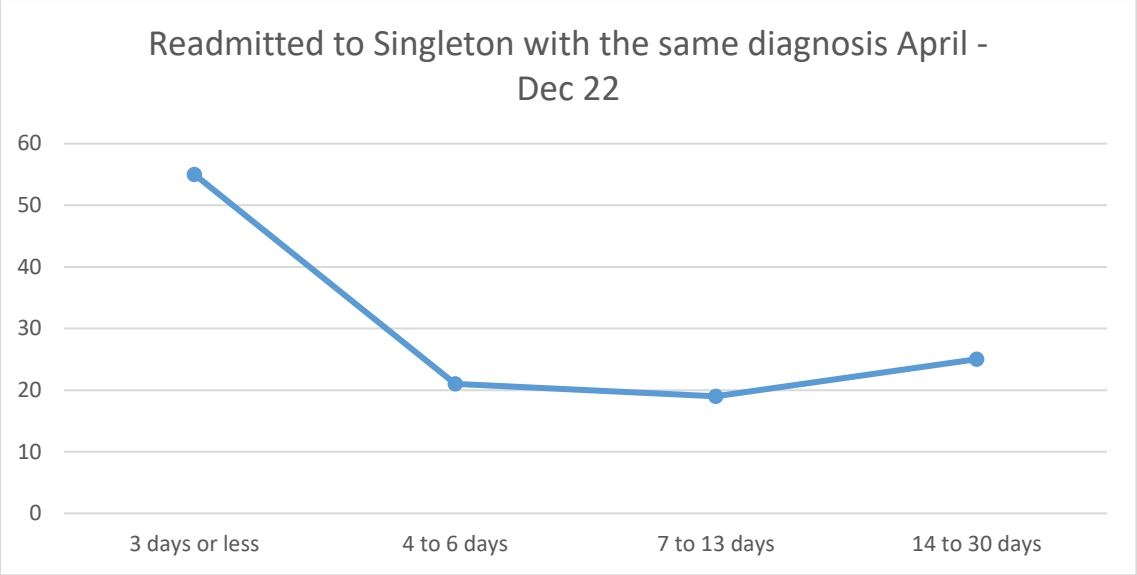

Figure 4

b) Readmission 30 days post discharge for Morriston and Singleton January – June 2023 (post-AMSR)

In the post AMSR period from January to June 2023, although acute medicine and the take moved, there were still inpatient beds at Singleton up till September 2023. Hence some of the data is split between sites. The number of readmissions in Medicine at Morriston was 693, of these 228 patients were discharged from AMU assessment, followed by AMU short stay and SDEC (Figure 5).

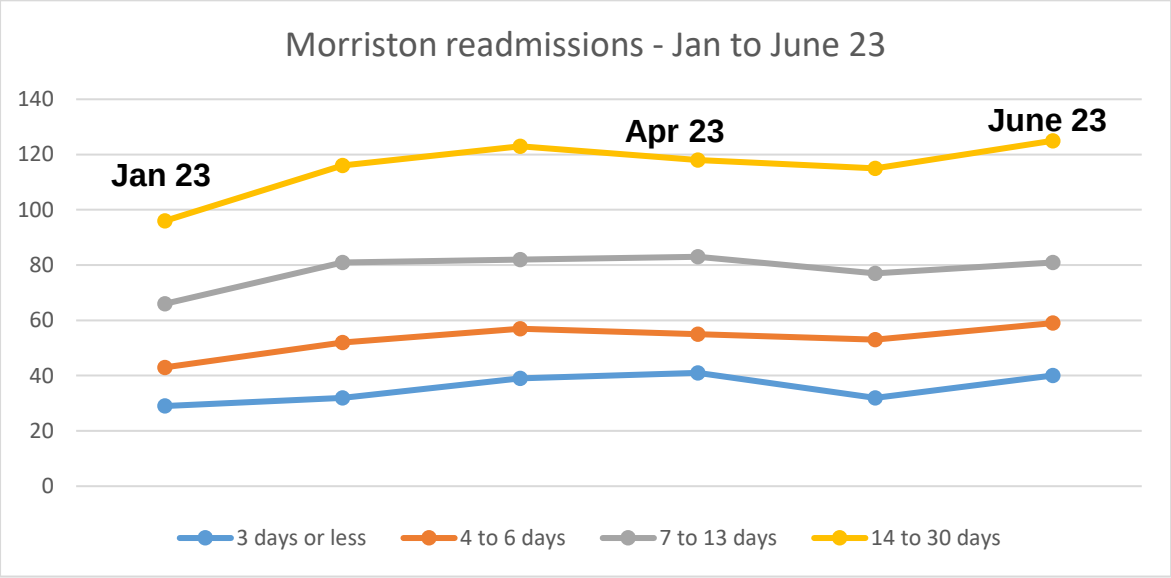

Figure 5

Over the same period, of the 228 readmissions 98 were admitted with the same diagnosis and majority of these were in the first 3 days (Figure 6).

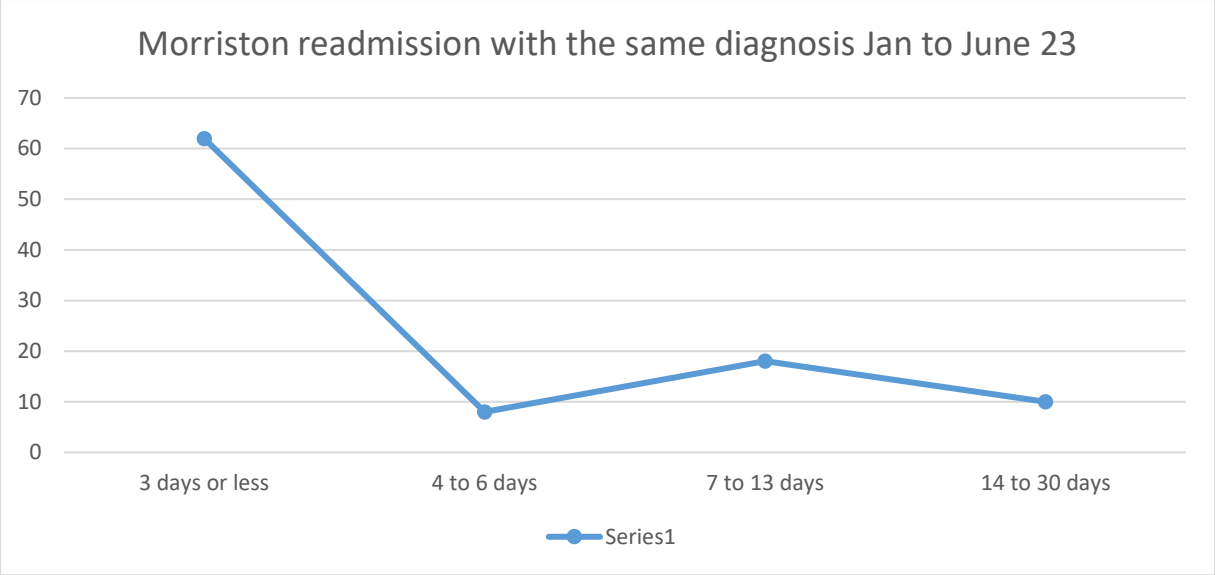

Figure 6

The numbers from Singleton Medical wards at Singleton were 46 over this six-month period reflecting the low level of acuity as expected (Figure 7).

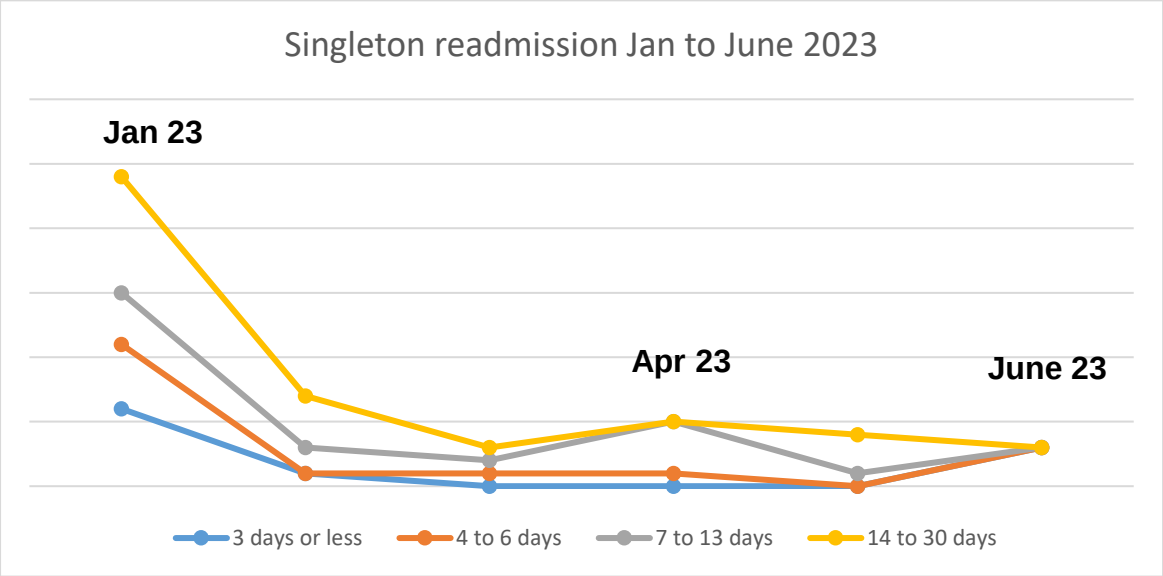

Figure 7

Of these 46 readmissions, eight were readmitted with the same diagnosis as shown below (Figure 8).

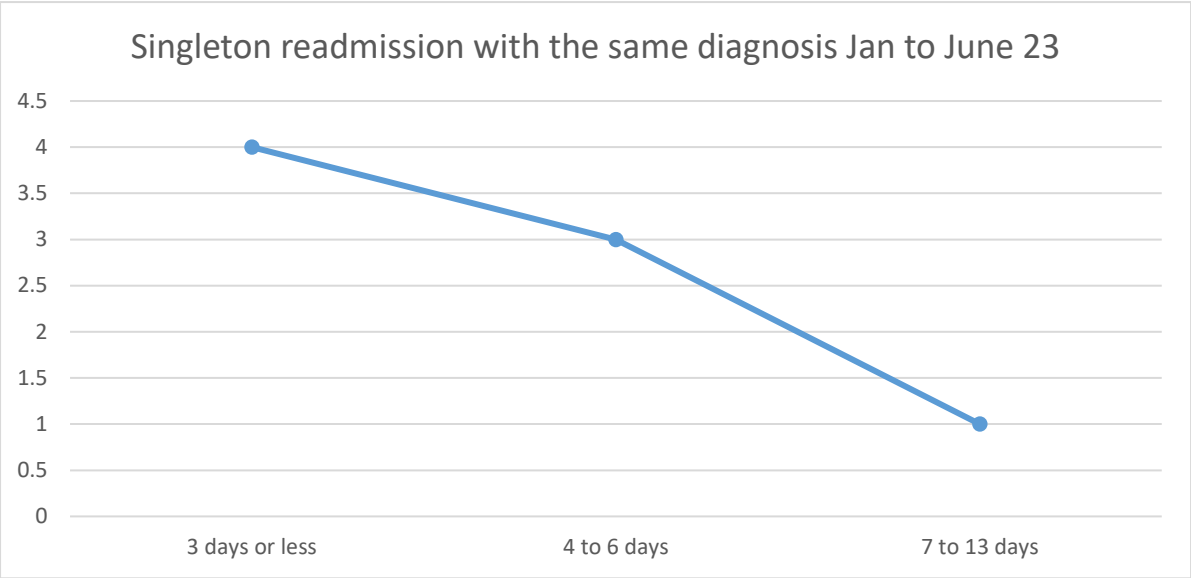

Figure 8

c) Mortality

The mortality number for the readmitted patients are as follows (Figure 9). The number of patients dying pre and post AMSR was the same apart from the spike in April 2023.

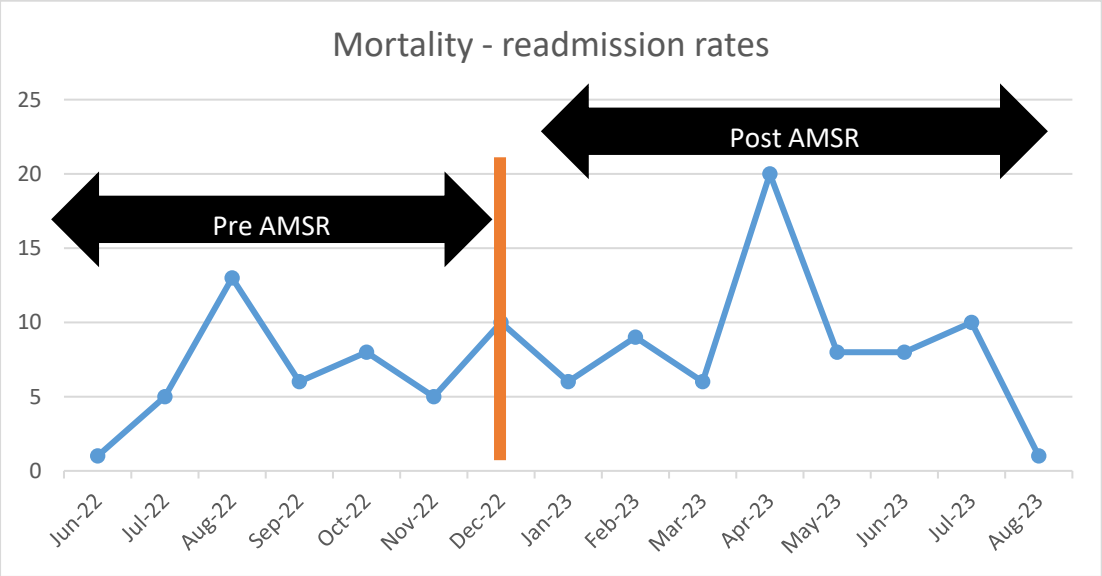

Figure 9

Since the commencement of the AMSR programme, all deaths within the Health Board is reviewed by the Medical Examiner and no particular trend was identified from this data source (Figure 10).

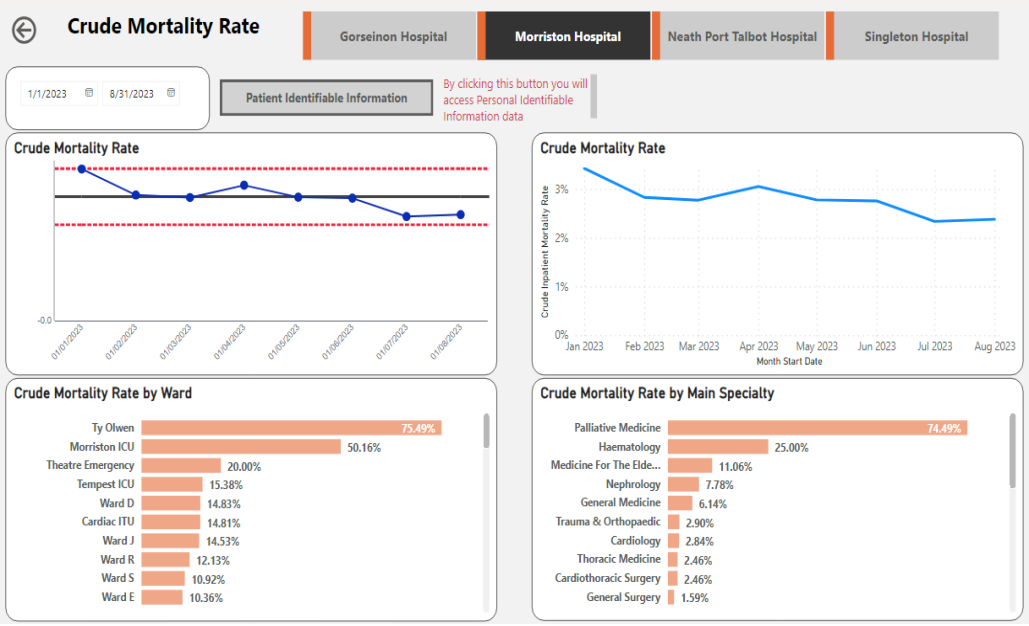

Figure 10

d) Percentage of readmissions from discharges from June 22 to June 23

The below graph demonstrates the readmission from discharges for both Morriston and Singleton pre and post AMSR (Figure 11). This is not a verified metric, but the trend is within the acceptable limits.

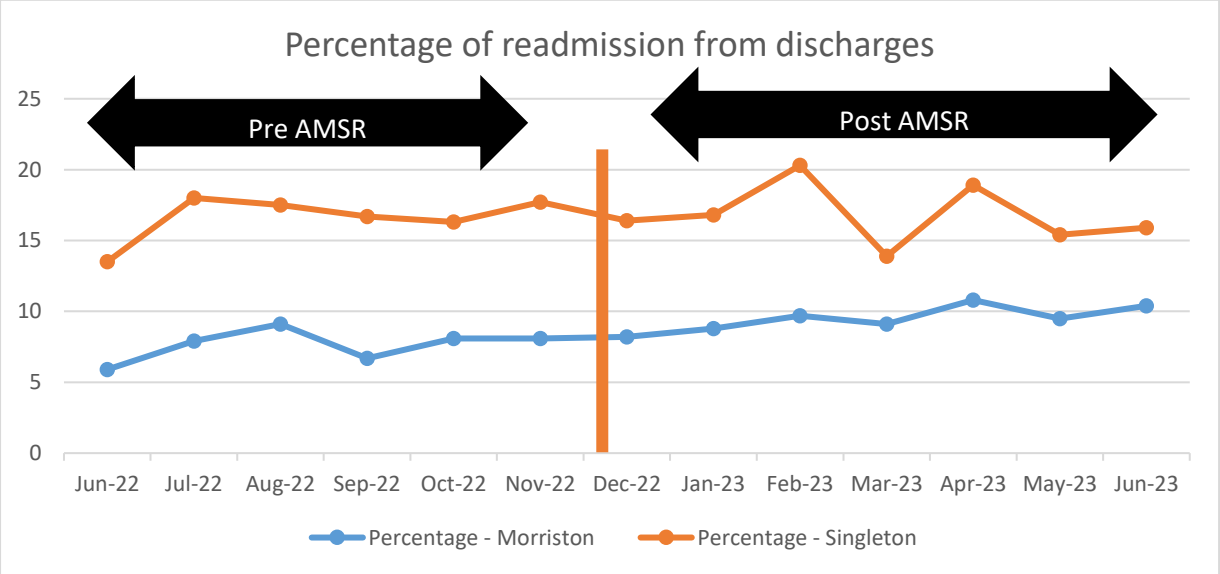

Figure 11

e) Alternative metric

As the number of patients with unplanned admission is not captured within the Health Board, the number of patients readmitted with the same diagnosis were reviewed and the breakdown was as follows (Table 1):

Unit	Readmitted with the same diagnosis	Total number of readmissions during the period	Percentage
Readmissions Apr – Dec 22			
Morriston	102	497	28.4%
Singleton	120	422	20.5%
Readmissions Jan – June 23			
Morriston	98	698	14.2%
Singleton	8	48	17.3%

Table 1

4. Limitations

Readmission rates, even though seen as a quality measure is not a perfect measure and has substantial limitations. Not all reasons for readmission are under the control of the health care service or hospital, and they also are not a measure of patient preference or experience. This should be borne in mind when meaningful interpretations are derived from observed changes in readmission rates and their relationship with the quality of care provided to patients.

As mentioned above, readmission rates are calculated on the number of unplanned admissions that occurred after discharge. This data is not collected within the HB and hence the data outlined in this paper has to be interpreted with caution.

5. FINANCIAL IMPLICATIONS

There are no financial implications.

6. CONCLUSION

Even though there are limitations to the data, the number of patients readmitted do not demonstrate huge variations both pre and post AMSR. The number of patients admitted with the same diagnosis was higher during the first three days post discharge and currently it is difficult to interpret whether they were planned or unplanned.

The mortality rates were no different to the patients readmitted pre and post AMSR. Since AMSR all HB deaths are reviewed by the Medical Examiner and no trends have been identified.

7. RECOMMENDATION

Members are asked to **note** the report and **approve** the following action points and outcomes:

a) 30 – day unplanned readmission data need to be captured on the Business Intelligence system. This should be applied for patients admitted via both the elective and emergency pathways. Planned reviews or re-admissions (SDEC/AEC with separate DAL created) should be excluded from the total readmissions.

b) Readmission data should be monitored by the Service Groups at the Quality and Safety meetings and improvement plans must be developed in response to any variance.

Governance and Assurance		
Link to Enabling Objectives ***(please choose)***	**Supporting better health and wellbeing by actively promoting and empowering people to live well in resilient communities**	
	Partnerships for Improving Health and Wellbeing	☐
	Co-Production and Health Literacy	☐
	Digitally Enabled Health and Wellbeing	☐
	Deliver better care through excellent health and care services achieving the outcomes that matter most to people	
	Best Value Outcomes and High Quality Care	☐
	Partnerships for Care	☐
	Excellent Staff	☐
	Digitally Enabled Care	☐
	Outstanding Research, Innovation, Education and Learning	☐
Health and Care Standards		
(please choose)	Staying Healthy	☐
	Safe Care	☐
	Effective Care	☐
	Dignified Care	☐
	Timely Care	☐
	Individual Care	☐
	Staff and Resources	☐
Quality, Safety and Patient Experience		
The describes the trends in the number of patients readmitted after discharge from General Medicine. The trends pre and post AMSR is analysed in this paper.		
Financial Implications		
There are no financial implications		
Legal Implications (including equality and diversity assessment)		
There are no legal implications		
Staffing Implications		
None		
Long Term Implications (including the impact of the Well-being of Future Generations (Wales) Act 2015)		
Report History	Does not apply	

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Appendices	None