# **System Level Measures**

# Improvement Plan 2018-19



## INTRODUCTION

The Canterbury Health System places a high priority on implementing the System Level Measures Framework to support change and system improvement. We are pleased to report we have comprehensively progressed the *Actions to Improve Performance* detailed in Canterbury's 2017/18 Improvement Plan and the System Level Measures continue to track favourably. These benefits have resulted from positioning the System Level Measures Framework as an integral part of Canterbury's mechanisms for engaging the relevant stakeholders including our clinical teams from across the system in leading change.

The expert groups, including the Service Level Alliances and Workstreams within the Canterbury Clinical Network District Alliance, have delivered on the agreed actions and monitored their performance against the contributory measures. More recently these groups have undertaken a comprehensive review of their progress ahead of prioritising future actions in their 2018/19 work plans, and where necessary, refining the contributory and secondary measures used to track their progress.

With the System Level Measures Framework now established within Canterbury's way of working, over the next 12 months a greater focus will be placed on strengthening the communication of the System Level Measures Framework across our health system. This will include providing data to a breadth of providers and accompanying it with relevant information on ways they can contribute to improving our identified priorities. Alongside this will be the ongoing focus on addressing health inequities, including highlighting where ethnic variation in the measures exist and prioritising actions that will reduce inequities.

Key changes in our 2018/19 Improvement Plan include updating the Actions to Improve Performance, refining some contributory measures including presenting these by ethnicity where appropriate, and resetting the System Level Measures milestones. We are pleased to continue demonstrating Canterbury Health System's commitment to improving the health outcomes of our population through our collective identification of priorities, redesign of services and implementation of transformation changes in the way health care is delivered through this Plan.



## MESSAGE FROM SIR JOHN HANSEN

#### ALLIANCE LEADERSHIP TEAM CHAIR | CANTERBURY CLINICAL NETWORK

We're extremely fortunate to have people who are committed to achieving better health outcomes for the people of Canterbury and putting in the hard work to make sure this happens. Each and every day staff across the Canterbury health system play a major role

in helping us achieve this goal – whether it's delivering services at the coal face or keeping things running smoothly behind the scenes.

Looking back over the past year reinforces that working collaboratively towards a shared set of improvement measures enables us to make significant gains in improving and enhancing health services for our community.

But all transformational change needs a long-term approach. By establishing clear outcomes, continually reviewing progress and making improvements on an ongoing basis we're creating a sustainable health system more intuitive, effective and meaningful for our community.

David Meates Chief Executive Officer Canterbury DHB

Prof. Les Toop Chair Pegasus Health Charitable Ltd

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Dr Lorna Martin Chair Rural Canterbury PHO

Dr Angus Chambers Chair Christchurch PHO

#### INTEGRATING THE SYSTEM LEVEL MEASURES FRAMEWORK INTO OUR HEALTH SYSTEM

Canterbury's way of working brings together expert groups, including Service Level Alliances, Workstreams, and workgroups within the Canterbury Clinical Network Alliance with the aim of leading change in health services that improve the health outcomes of our population. Typically these groups include urban and rural clinicians who participate in the services, people that bring consumer, Māori, Pacific and rural perspectives, and management from the relevant organisations.

An expert group has been identified to lead each of the System Level Measures contributory and system measures and associated activity. A table illustrating which expert group(s) are leading each of the contributory measures is included in Appendix One. Also shown in this table are the expert groups that link with and/or support this activity. A System Outcomes Steering Group involving clinical leaders from across the system, public health experts, quality improvement staff, analysts and planners is in place to guide Canterbury's ongoing development of the System Level Measures framework. Figure 1. Illustrates the roles of this Steering Group and various expert groups.

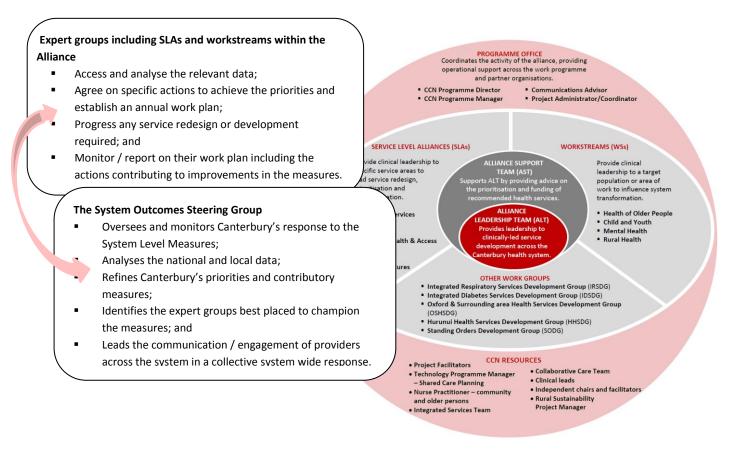


Figure 1: Summary of the role of the System Outcomes Steering Group and the expert groups leading each contributory measure.

#### **KEY ACHIEVEMENTS**

Significant progress has been made against the *Actions to Improve Performance* identified in Canterbury's 2017/18 Improvement Plan. A snapshot of some key achievements are highlighted below.



#### More newborns are enrolled in Community Dental Services

Implementation of the LinKids multiple enrolment form has contributed to an increase in the percentage of newborns enrolled in Community Dental Services to 76% in 2017 up from 61% in 2016.

#### Greater understanding of the ethnic variation in our 0-4 ASH rate

The findings from research on why Pacific 0-4 year olds are more likely to end up in hospital with ASH conditions is helping inform the next steps to addressing the ethnic variation in Canterbury's 0-4 year old ASH rate.





#### Improved access for pregnant women to specialist smoking cessation support

The implementation of an incentivised pregnancy smoking cessation programme has contributed to 84 pregnant women receiving specialist smoking cessation support in the six months to 31 December 2017, and referrals being received from a range of providers, including Lead Maternity Carers, secondary care services, pharmacists, and general practice teams.

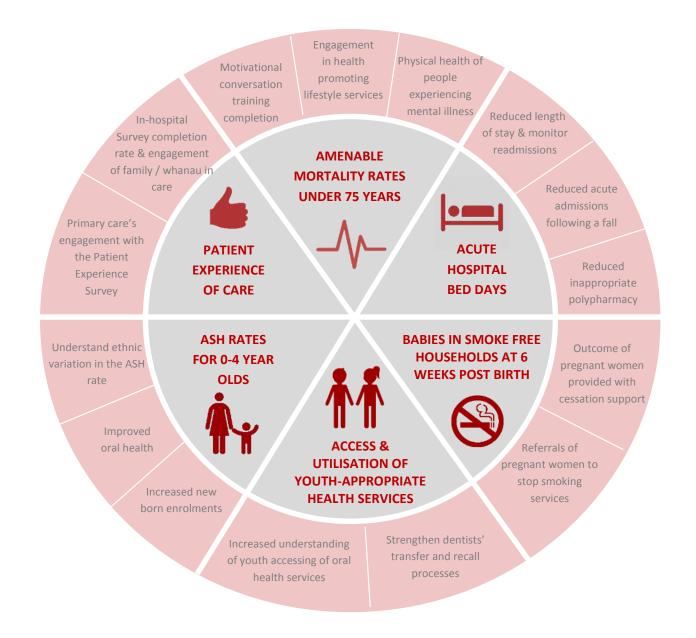
#### More general practices are accessing feedback from their enrolled population

71 (62%) general practices in Canterbury are now using the Primary Care Patient Experience Survey to access feedback from their enrolled patients, up from 50 (42%) 12 months earlier.



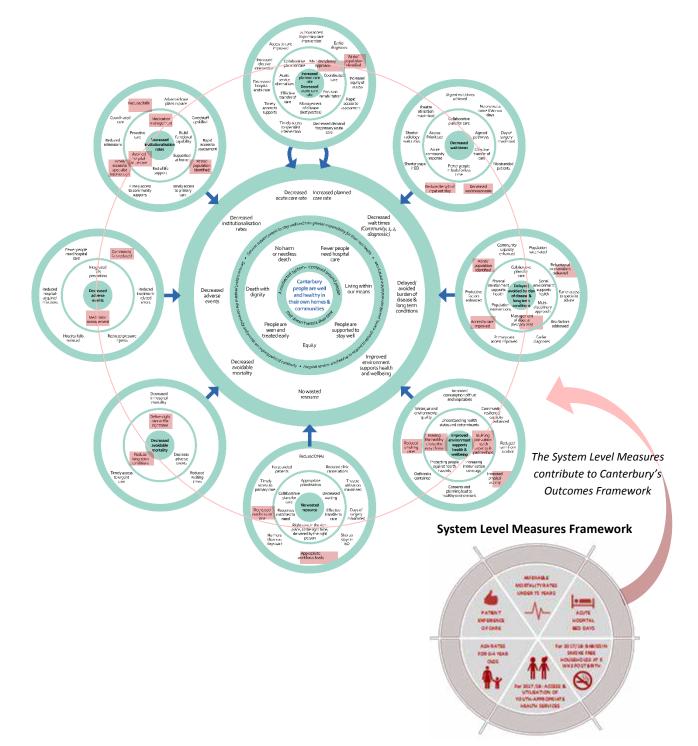
## CANTERBURY'S SYSTEM LEVEL MEASURES FRAMEWORK

The diagram below demonstrates Canterbury's System Level Measures Framework. In the centre are the System Level Measures and circling those are the locally-selected contributory measures. Further detail on each contributory measure is provided below.



## HOW IT ALL FITS TOGETHER

The Canterbury Health System has tracked performance of our increasingly integrated and patient-centred approach through the Canterbury Health System Outcomes Framework since 2013. The System Level Measures and contributory measures detailed in this Improvement Plan are integrated into our existing Outcomes Framework to demonstrate their alignment with Canterbury's approach. The measures identified in this document have been highlighted below within Canterbury's Outcomes Framework to illustrate this alignment.



#### **Canterbury Health System Outcomes Framework**

#### System level measure:

## **AMBULATORY SENSITIVE HOSPITALISATION RATE FOR 0-4 YEAR OLDS**

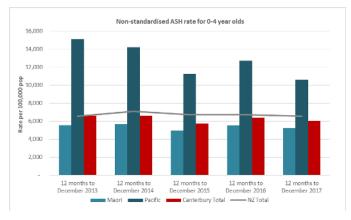
#### CANTERBURY'S EXPERIENCE

Our priority is to reduce the ethnic variation in the ambulatory sensitive hospitalisation (ASH) rate between the Pacific and Total populations.

At December 2017 Canterbury's ASH rate for 0-4 year olds of 6,010 per 100,000 population is below the national average for the Total population<sup>1</sup> and, when viewed over the previous four years, continues to trend downwards. Canterbury's 0-4 year old ASH rate for the Pacific population of 10,595 per 100,000 is higher than the Total

population rate; however Canterbury's 0-4 year old ASH rate for the Māori population of 5,199 per 100,000 is lower than Canterbury's Total population rate. Viewing Canterbury's data by medical conditions illustrates:

- The Upper Respiratory and Ear Nose and Throat (ENT) Infections category is the largest contributor to Canterbury's ASH rate, at 2,002 per 100,000 Population.
- Canterbury's 0-4 year old ASH rates for Upper Respiratory and ENT Infections and Lower Respiratory Infections are higher than the national average.



In 2017/18 work was undertaken to better understand the contributors to the ethnic variation in Canterbury's 0-4 year old ASH rate. This included further analysis of the enrolment status and demographics of children admitted to hospital with ASH conditions and research on why children of Pacific ethnicity are more likely to end up admitted. The research identified some cultural factors including the concept of time and relationships with health providers, and how this may influence the way people from Pacific communities' access health care. This will be explored further in 2018/19 alongside work to increase general practice's visibility of their 0-4 year olds admitted with an ASH event, strengthen referral pathways to whānau ora providers, and increase the enrolment of newborns in a range of services including the Community Dental Service.

#### MILESTONE

Canterbury's internal target is to reduce the Pacific inequity in ASH rates, however the relatively small number of admissions and resulting inherent variation limits the viability of setting a numerical milestone. In addition, analysis of the leading conditions contributing to the ASH rate confirms that influenza, gastro-enteritis outbreaks and dental elective volumes have a significant influence on the yearly variation in ASH rate for 0-4

<sup>&</sup>lt;sup>1</sup> The National Minimum Data Set of ASH Rate for 0-4 year olds to December 2017 using the New Zealand Standard Population informed Canterbury's analysis and establishment of the 2018/19 milestones.

year olds across all populations. Acknowledging these challenges, the average ratio between the Total and Pacific populations (Total rate:Pacific) has been selected as the soundest approach to setting a milestone<sup>2</sup>.

The small actual numbers involved with the Pacific ASH rate mean there is potential for large fluctuations from quarter to quarter, for example, the addition of just 10 admissions changes the rate by 5% and increases the ratio by 0.1. To reduce the effect of fluctuations due to the small Pacific population in Canterbury the milestone has been calculated based on a four-year average.

The four year average for previous years has been 1:2.11 and 1:1.97. At this rate of reduction the four year average in December 2017 will be 1:1.84. Over 2018/19 Canterbury will track and aim to reduce the average ratio (Total rate:Pacific) over four years, to achieve a ratio of 1:1.84, or less, by 30 June 2019<sup>3</sup>.

	12 mo. to Dec 2013	12 mo. to Dec 2014	12 mo. to Dec 2015	12 mo. to Dec 2016	12 mo. to Dec 2017	Forecast 12 mo. to Dec 2018 (forecast based on previous years)
Pacific Rate	2.30	2.16	1.97	1.99	1.76	1.67
4-year average				2.11	1.97	1.84

### CONTRIBUTORY MEASURES

### ASH RATE - VARIATION BETWEEN POPULATIONS

*Outcome sought:* Understand the variation that exists between the Canterbury Total and Canterbury Pacific populations, with a focus on the ASH admissions for 0-4 year olds coded with Upper and ENT Respiratory Infections.

*Rationale for selection:* A variation in the ASH rate for 0-4 year olds exists between the two population groups. This is evident in the Diagnosis Related Group (DRG) category Upper and ENT Respiratory Infections which is the single largest contributor to the ASH rate for 0-4 year olds and is above the national average. While the December 2014 ratio between the Pacific and Total population of 1:2.17 has decreased to 1:1.34 in December 2017, true progress will be achieved through monitoring our progress over an extended period of time to account for inherent variation.

<sup>&</sup>lt;sup>2</sup> Target setting for ASH rates is difficult due to the uncertainty around projecting future rates, based on the inherent variability of events in a relatively small population. For the 12 months to September 2014, the ASH rate for Pacific 0 to 4 year olds was 14,225 per 100,000 population, with a calculated 95% confidence interval of 12,707 to 15,744; for the Total population the rate was 6,583, and the 95% confidence interval was 6,300 to 6,865. For the purposes of projecting a future target, based on these data, the ratio of Pacific to Total ASH rates may lie between 1.85 (using the lowest extent of the 95% confidence interval for Pacific and the highest for Total population) and 2.50 (using the highest extent of the 95% confidence interval for Pacific and the ratios therefore need to be interpreted with caution and looked at over a longer reporting period.

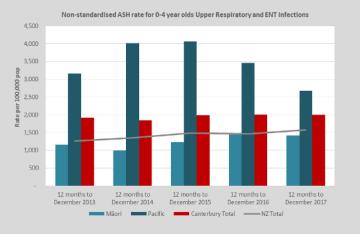
<sup>&</sup>lt;sup>3</sup> The December 2017 dataset was used to generate the milestone. The four year average for previous years has been 2.11 and 1.97. Using the forecast function in Microsoft Excel the four year average in December 2018 will be 1.84.

#### Measure description:

The rate of 0-4 year olds admitted with a code of Upper Respiratory and ENT Infections and the gap that exists between the ASH rate for 0-4 year olds in Canterbury's Pacific and Total populations.

*Numerator:* The number of ASH admissions for 0-4 year olds coded with Upper and ENT Respiratory Infections.

*Denominator:* The number of 0-4 year olds. *Data source:* Ministry of Health data released quarterly.



#### **ORAL HEALTH**

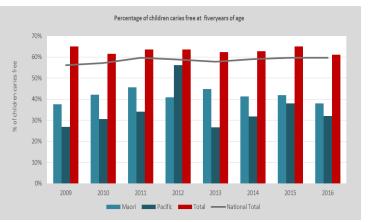
Outcome sought: An increase in the number of children who are caries free at five years of age.

*Rationale for selection:* Dental conditions are the fourth largest contributor to Canterbury's ASH rate for 0-4 year olds with a rate of 618 per 100,000 at December 2017. In addition, there is local variance between population groups in both caries free and enrolment in the Community Dental Service. This measure has been selected from a number of oral health / child health indicators, including the enrolment of children in the wider health services. It should be noted that Canterbury currently does not add fluoride to its water supply, unlike many other North Island metropolitan areas.

*Measure description:* The percentage of children caries free at five years of age.

*Numerator:* At the first examination after the child has turned five years, but before their sixth birthday, the total number of children who are caries free (decay or filling free).

*Denominator:* The total number of children who have been examined in the five-year-old age group, in the year to which the reporting relates. *Data Source:* Community Dental Service.



#### **INCREASED ACCURACY OF ETHNICITY CAPTURE**

*Outcome sought:* Increase the accuracy of ethnicity capture of new borns enrolled in general practice. *Rationale for selection:* The collection of robust quality data enables the monitoring of access rates and results by ethnicity; this in turn supports improved health planning and design and delivery of services aimed at reducing health inequities. Any inaccurate capture of ethnicity at birth follows the new born's registration into other services. *Measure description:* This measure requires further analysis to identify the contributors of the inaccurate

ethnicity capture, the subsequent actions required and the key metric for monitoring change. In the interim, the new borns enrolled in a PHO within three months by ethnicity illustrated below, will be monitored.

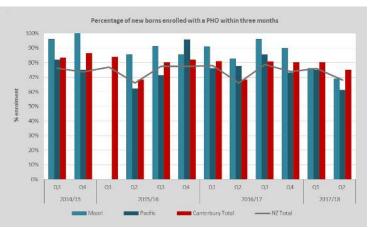
#### **INCREASED NEWBORN ENROLMENT**

*Outcome sought:* An increase in the number of new borns enrolled in general practice.

*Rationale for selection:* Early enrolment in general practice and the wider health services (including Well Child Tamariki Ora and the Community Dental Service) is a foundation for patients accessing health care. There is variability in the new born enrolment coverage, most noticeably in the Pacific population.

*Measure description:* The percentage of new borns enrolled with a PHO within three months. *Numerator:* Number of infants under three months enrolled with a PHO.

*Denominator:* Number of births reported to the National Immunisation Register. Note the register includes all babies born in Canterbury, some of whom are not from our region.



Contributory Measure	Actions to Improve Performance	Responsibility
ASH Rate	<ul> <li>Strengthen referral pathways from the health system to Whānau Ora providers (i.e. Paediatric Department to Māori and Pacific Whānau Ora navigators for children admitted acutely).</li> <li>Undertake further research that builds on recent findings of the reasons why children of Pacific ethnicity are more likely to end up admitted with an ASH condition.</li> <li>Increase general practices visibility of their enrolled 0-4 year olds who are admitted to hospital with an ASH event.</li> </ul>	A project group within the Child and Youth Workstream
Oral Health	<ul> <li>Advocate for fluoridation of the drinking water supplies in Canterbury.</li> <li>Strengthen the Community Dental Service's current recall system.</li> <li>Develop a process for engaging caregivers of children in health services at birth but do not require the service until they are two years old.</li> <li>Note: Any increase in enrolments in the Community Dental Service, particularly of high risk patients, may initially decrease the percentage of children caries free at 5 years of age.</li> </ul>	Oral Health Service Development Group
New Born Enrolment	<ul> <li>Agree a communication process between the National Immunisation Register and PHOs to assist with enrolling children in general practice.</li> </ul>	Immunisation Service Level Alliance and PHOs
Increased Accuracy of Ethnicity Capture	<ul> <li>Complete work with Canterbury's three PHOs to ensure all Patient Management Systems accommodate the 2017 Ethnicity Data Protocols and provide training on the capture of accurate ethnicity through this process.</li> </ul>	Immunisation Manager and PHOs, Māori and Pacific Reference Groups

#### ACTIONS TO IMPROVE PERFORMANCE: ASH RATE FOR 0-4 YEAR OLDS

•	Continue providing training to new midwives on the 2017
	Ethnicity Data Protocols to increase the accuracy of ethnicity
	recorded in Maternity Hospital Specialist Services.

#### System level measure:

## **ACUTE HOSPITAL BED DAYS**

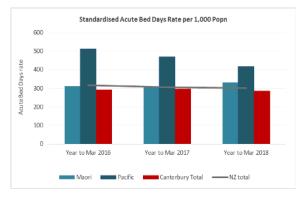
#### CANTERBURY'S EXPERIENCE <sup>4</sup>



Our priority is to further reduce the acute hospital bed day rate for the Total population, while optimising hospitalisation for all ethnic groups.

Averaged over the three years to March 2018, Canterbury DHB's Age Standardised Acute Bed Day rate of 290 per 1,000 population was 6.3% lower than the New Zealand Total rate of 309 per 1,000. Viewed by ethnicity<sup>5</sup>, averaged over the three years Canterbury's Standardised Acute Bed Day rates for the Māori population (315 per 1,000) and Pacific population (466 per 1,000) are higher than Canterbury's Total Acute Bed Day rate; while the Other population rate is lower at 284 per 1,000 population.

Māori and Pacific perspectives are an embedded part of Canterbury's Alliance; membership across expert groups and Reference Groups offer guidance in all aspects of service redesign. Over 2017/18 the DHB and Pasifika Futures Boards committed to working in partnership to improve the health of Canterbury's Pacific population. In 2018/19 this work will continue and include implementing innovative approaches to the funding and the delivery of health services that align with a Pasifika view of health.



Viewing Canterbury's data by medical conditions illustrates that the Stroke and Other Cerebrovascular Disorders category is the largest contributor to Canterbury's Acute Bed Day rate at 21 per 1,000 population, and is higher than the national average of 17 per 1,000. In 2018/19 a comprehensive analysis of the care provided to people admitted with a Stroke and Other Cerebrovascular Disorders will be undertaken to identify further opportunities to optimise the patients' in-hospital stay and timely discharge, noting that any change will require a system wide response.

Over the last three years a number of Canterbury's rural communities have engaged in developing new models of care that identify opportunities for service improvements while ensuring the sustainability of the rural health services. In the Hurunui region this has culminated in recommendations to implement an acute observation and nursing service and establish a restorative community service. By assisting people to access these services locally, and supporting their timely discharge after a hospital event or period of illness, these initiatives will contribute to optimising Canterbury's Acute Bed Day rate. In 2018/19 the design and implementation of these initiatives will be progressed.

<sup>&</sup>lt;sup>4</sup> The National Minimum Data Set Acute Hospital Bed Days to December 2017 (using Age Standardisation to the WHO 2000 Standard Population) was used to inform Canterbury's analysis and establishment of the 2018/19 Milestones.

<sup>&</sup>lt;sup>5</sup> The National Minimum Data Set Acute Hospital Bed Days to December 2017 (age standardised using WHO 2000 Population Standard) by prioritised ethnic groups

#### MILESTONE

Despite Canterbury's Acute Bed Day rate being significantly below the national average, further reducing this rate is a high priority for Canterbury to manage its population within a constrained bed supply that will continue, even after the new Acute Services Building opens in 2018/19. Higher than projected population growth is anticipated to place pressure on Canterbury's inpatient capacity with system-wide efforts underway to manage the demand on hospital services.

In this context, work to reduce the ethnic variation in the Acute Bed Day rates is being progressed alongside a focus (and setting of a milestone) on Canterbury's Total Acute Bed Days rate. Canterbury considered setting a milestone based on the ethnic variation between the Māori, Pacific and total population, however it is unclear what ethnic variation is appropriate. Striving for equivalent acute bed day rates across all ethnicities may lead to Māori and Pacific populations who have a higher burden of disease not receiving optimal access to acute hospital care. In seeking equitable health outcomes Canterbury will work towards appropriate hospitalisation for all ethnicities.

Finally, in the process of establishing an achievable milestone for 2018/19, further analysis of Canterbury generated data on Acute Bed Days was undertaken including consideration of the admitting medical conditions and how amenable they were to change. Grouping the Acute Bed Days into those amenable to change (Medical, Surgical and Rehabilitation admissions) and non-amenable (Mental Health and Maternity admissions) highlighted that a realistic milestone would be based on 85% of the total Acute Bed Days. While this approach could not be replicated using the National Service Framework Library data set, these local calculations continue to inform the setting of Canterbury's milestone.

The Canterbury Health System's agreed milestone for June 2019 is to reduce the Acute Bed Days rate to 289 per 1,000 population or less.<sup>6</sup> This has been generated using Canterbury's Acute Bed Days average over the three years to March 2018. It is noted that within this longer-term trend, the Acute Bed Days rate will be influenced by external factors such as the severity of the influenza season.

#### CONTRIBUTORY MEASURES

#### **REDUCED LENGTH OF STAY FOR ACUTE ADMISSIONS**

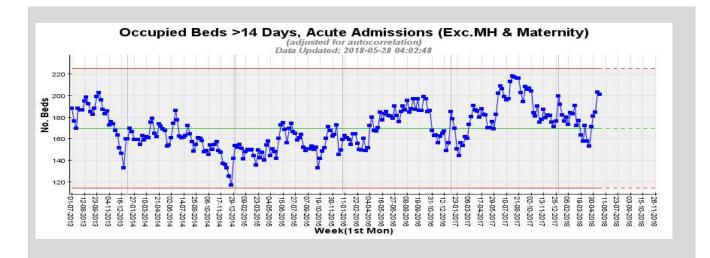
*Outcome sought:* To reduce the number of occupied bed days following an acute admission while ensuring patients receive clinically appropriate care during their hospital stay and after discharge, to avoid a readmission.

*Rationale for selection:* Canterbury's investment in primary care and work on condition specific pathways has supported an overall reduction in the acute phase of hospital stays. At September 2016 Canterbury's standardised average length of stay of 2.41 bed days is below the New Zealand average stay of 2.54 bed days<sup>7</sup>. *Measure description:* The number of beds occupied for greater than 14 days following an acute admission. Note patients coded as Mental Health and Maternity are excluded. While a number of measures will be monitored locally as indicators of the length of stay for acute admissions, this measure is considered a key metric for monitoring change.

<sup>&</sup>lt;sup>6</sup> Milestone set using the National Minimum Data Set Acute Hospital Bed Days to March 2018 (age standardised using WHO 2000 Population Standard) by prioritised ethnic groups. The previous three years (March 2016-18) Total rate was averaged to develop the milestone for June 2019.

<sup>&</sup>lt;sup>7</sup> National Minimum Data Set Inpatient Average Length of Stay (OS8) at September 2016 (standardised on age, sex, ethnicity, rurality, deprivation, acuity, primary diagnosis, secondary diagnoses, comorbidity/complexity, operations, external cause codes)

Data source: Local data generated through Signals from Noise (SFN).



#### MONITOR ACUTE READMISSIONS

*Outcome sought:* That people receive effective (and safe) treatment in our hospitals, as well as appropriate support and care on discharge.

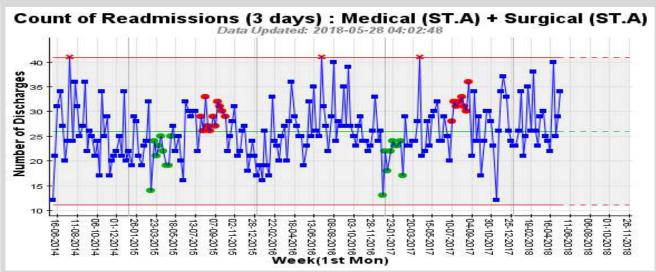
*Rationale for selection:* Measures of readmission rates are important balancing metrics for the reduced length of stay for acute admissions. Monitoring the rates at different times post-discharge provides a more comprehensive picture of factors contributing to readmissions, and better informs the response required.

The selection of both the 3 day and 28 day readmission rates as contributory measures provide appropriate balancing metrics. The contributors to the readmission rates are multifaceted. Based on current knowledge, it is proposed that an acute readmission to hospital within 3 days may be an indicator of a 'failed discharge'. Any increase in this rate would suggest further exploration into discharge timing, planning and its implementation, and patient readiness was required. While an increase in the 28 day readmission rate could be driven by an additional number of factors; with further investigation into contributors such as patients' access to services, the disease process, the integration and coordination of primary care and community services required.

*Measure description:* Monitor Canterbury's acute readmission to hospital within 3 days.

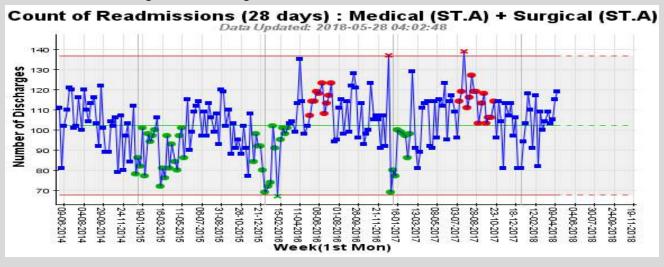
*Numerator:* Canterbury's average number of acute readmission stays in hospital within 3 days for a medical or surgical admission.

Data source: Local data generated through SFN.



#### *Measure description:* Monitor Canterbury's acute readmission to hospital within 28 days.

*Numerator:* Canterbury's average number of acute readmission stays in hospital within 28 days for a medical or surgical admission.



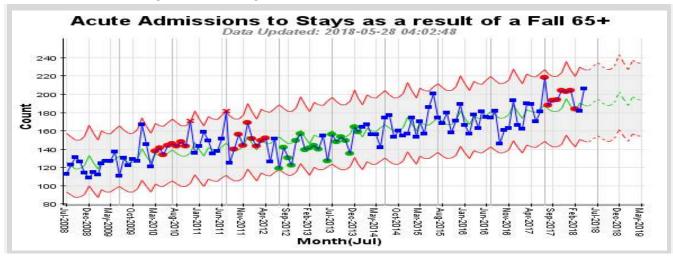
Data source: Local data generated through SFN.

#### **REDUCTION IN FALLS**

*Outcome sought:* A reduction in the number of acute admissions to hospital following a fall for those aged 65 years and over.

*Rationale for selection:* Hip and Femur Procedures, Hip Replacements, and Humerus, Tibia, Fibula and Ankle Procedures, are in the top fifteen DRG clusters<sup>8</sup> contributing to Canterbury's Acute Bed Days rate. A high proportion of patients entering rehabilitation (which is generally a longer component of a patient's overall stay) have a primary code of femur, humerus and other fractures. Given Canterbury's ageing population, reducing the harm from falls will reduce the fracture related demand on acute services and help people to stay well and independent in their own homes, whilst maintaining quality of life.

*Measure description:* A decrease in the number of acute admissions against a forecasted pre-intervention trend of the number of acute admissions to hospital following a fall for those aged 65 years and over. *Data source:* Local data generated through SFN.



<sup>8</sup> Top 15 Grouped by the Highest Case Weighted Hospital Event within each Acute Stay at March 2018 (WHO 2000 Population Standard).

#### POLYPHARMACY

*Outcome sought:* Prevention of, or a reduction in, the risks associated with polypharmacy.

*Rationale for selection:* The appropriate prescribing and dispensing of medications for people aged 65 years and over will support improved health outcomes for older people, which is important for the Canterbury Health System given its aging population. This measure is also an indicator of integration across general practice, community pharmacy, and hospital care.

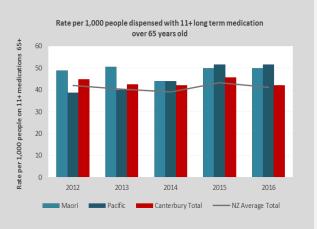
Note: It is acknowledged that while any medication therapy assessment will determine the appropriateness of medications; it may not impact the number of medications being taken. The number of polypharmacy audits completed and referrals for medication therapy assessments will be monitored locally alongside the rate of people aged 65 years and over on 11+ medications.

*Measure description:* The rate of people dispensed with 11 or more long term medications.

*Numerator:* The count of patients aged 65 years and over who have been dispensed 11 or more distinct chemicals in two consecutive quarters.

*Denominator:* The count of the DHB population that is aged 65 years and over.

*Data source:* The Health Quality and Safety Commission (HQSC) Atlas of Variation.



#### ACTIONS TO IMPROVE PERFORMANCE: ACUTE BED DAYS RATE

Contributory Measure	Actions to Improve Performance	Responsibility
Reduced Length of Stay	<ul> <li>Complete an analysis of the care provided to people categorised with Stroke and Other Cerebrovascular Disorders. Identify opportunities to optimise these patients' in-hospital length of stay, timely discharge, and access to community services.</li> <li>Identify measures of progress through each phase of the patient's in-hospital stay.</li> <li>Initiate the implementation of any changes identified to optimise the patient pathway.</li> </ul>	Adult Rehabilitation Steering Group.
Monitor Acute Readmissions	<ul> <li>Continue to monitor the number of readmissions as a balancing metric alongside the implementation of changes in patient pathways and length of stays.</li> </ul>	Urgent Care Service Level Alliance
Minimise Harm from Falls	<ul> <li>Increase referrals to the in-home Falls Prevention Programme.</li> <li>Extend the Community Based Strength and Balance classes to make 4,000 places available.</li> </ul>	The Falls and Fracture SLA

Polypharmacy	<ul> <li>Increase general practices visibility of their enrolled patients on multiple medications, including by ethnicity.</li> <li>Provide primary care with education about inappropriate polypharmacy and encourage general practices to audit and review patients on multiple medications.</li> <li>Analyse polypharmacy patterns in Canterbury including by age band and ethnicity, to guide any refinement of the actions to improve performance.</li> <li>Prompt general practice's consideration of whether a patient referred to the Falls Prevention Programme will benefit from a review of their medications, and vice versa.</li> </ul>	An expert project group convened by the Clinical Quality Education Team and the Pharmacy Service Level Alliance.
System Level Measure	<ul> <li>Continue working with Pasifika Futures to identify and implement innovative approaches to the funding and the delivery of health services.</li> <li>Establish a Pasifika focused wellbeing service that provides holistic wrap-around care to Pasifika patients enrolled with all general practices.</li> </ul>	Canterbury DHB and PHOs
System Level Measure	<ul> <li>Develop a model of restorative home-based care for rural people to support discharge and/or restored function following a period of illness.</li> <li>Trial an observation service that provides advanced assessment and treatment during a short term admission in the Hurunui region.</li> </ul>	Rural Health Workstream

## **PATIENT EXPERIENCE OF CARE**

#### CANTERBURY'S EXPERIENCE

Our priority for Patient Experience of Care is to facilitate optimal use of information from the in hospital and primary care patient experience surveys to drive quality improvement.

#### In-Hospital Patient Experience Survey

Canterbury's results from the four domain overall questions are consistently at or above the New Zealand average results<sup>9</sup>.

Domain – Overall Question	Canterbury weighted average score out of 10 for Q2 2016 – Q1 2018	NZ weighted average score out of 10 for Q2 2016 – Q1 2018
Communication	8.4	8.4
Coordination	8.5	8.4
Partnership	8.6	8.5
Physical & Emotional Well-being	8.7	8.7

Figure 2: Canterbury DHB Adult In-Hospital Survey Results (Q2 2016 – Q1 2018), Health and Quality Safety Commission

Over the last 12 months, work has been undertaken to increase the sample size and quantity of feedback contributing to Canterbury's results, with the local data (collected fortnightly) now included with the national quarterly collection.

#### Primary Care Patient Experience Survey

Canterbury's results from the four domains are at or above the New Zealand average results for the 12 months to Q1, 2018.

Domain – Overall Question	Canterbury weighted average score out of 10 from Q2 2017 to Q1 2018	NZ weighted average score out of 10 for Q2 2017 – Q1 2018
Communication	8.5	8.5
Coordination	8.6	8.6
Partnership	7.7	7.6
Physical & Emotional Well-being	7.9	7.8

Figure3: Canterbury Patient Experience Survey Results (Q2 2016 – Q1 2018), Health and Quality Safety Commission

In February 2018, 71 (62%) of Canterbury's 115 general practices obtained feedback from their patients using the Patient Experience Survey, up from 50 (42%) of 116 practices in February 2017. Canterbury's response rates to the survey aligns with national levels of response. A total of 1,142 (20%) of the 5,748 invited patients completed the survey in February 2018.

<sup>&</sup>lt;sup>9</sup>National Adult In-Patient Experience Results for Patients Treated in February 2018.

Over the next 12 months the priority will be to increase the number of general practices accessing feedback from their patients using the Patient Experience Survey. Alongside this, the survey response rate will be monitored and analysis undertaken locally on whether any respondent groups are underrepresented. This will guide ongoing work to increase the response rate and focus future efforts on accessing feedback from specific population groups.

#### MILESTONE

#### In-Hospital Patient Experience Survey

With the ongoing construction of new facilities around existing infrastructure continuing to impact on patients' experience of care, maintaining the inpatient survey results at 30 June 2019 will locally be considered a significant achievement.

#### Primary Care Patient Experience Survey

In 2017/18 the number of general practices using the Patient Experience Survey to access feedback from the enrolled population increased. In 2018/19 Canterbury's focus will shift to using the data collected to inform and drive quality improvement.

The shift to quality improvement is predominantly reliant on establishing effective processes that assist with analyses that make this accessible to providers; translating data into information that creates a platform for people to act upon. This makes setting a numerical measure that indicates progress on using data to drive quality improvement difficult. Canterbury has selected a milestone to improve the score for the following two sub-questions:

- Care Plans: After a treatment or care plan was made were you contacted to see how things were going? Average 12 month score 4.9/10 improvement to 5.1/10 or more.
- Medications: Were you told what to do if you experienced side effects? Average 12 month<sup>10</sup> score 6.7/10 improvement to 6.9/10 or more.

It is acknowledged that the influences on patient experience are complex. It will take efforts sustained over time to improve this and is likely to take more than the year of the improvement plan. The ongoing programme of work will be focussed on quality improvement through education and administration.

#### CONTRIBUTORY MEASURES

#### **IN-HOSPITAL SURVEY RESPONSE RATE**

*Outcome sought:* An increase in the proportion of adults completing the in-hospital survey.

*Rationale for selection:* Canterbury's Survey response rate was historically lower than the national rate. Improvements over 2016 reflect the increased focus on capturing patients' email addresses, allowing communication of the survey to them. During 2017 Canterbury merged fortnightly survey data collected locally

<sup>&</sup>lt;sup>10</sup> The 12 month period of 01/04/2017 to 31/03/2018 was used to calculate the average score for both of the sub-questions. The 12 month period of 1<sup>st</sup> April 2017 to 31<sup>st</sup> March 2018 was selected to enable comparison to the same 12 month period in one year to assess progress.

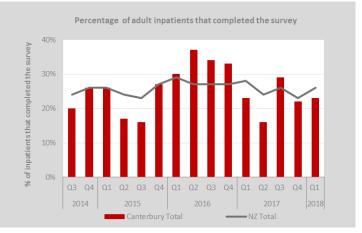
with the quarterly national collection to increase the number of respondents contributing to the results. While this initially impacted the In-Hospital Survey response rate, work over the next 12 months to systematically capture patients' email addresses as a business as usual process is anticipated to improve response rates over the long term.

Measure description: The proportion of adult inpatients who complete the survey.

*Numerator:* The number of hospitalised patients aged 15 years and over who provided feedback via the adult in-patient survey.

Denominator: The number of hospitalised patients aged 15 years and over who are surveyed.

Data source: The Health, Quality and Safety Commission.



#### IN-HOSPITAL ENGAGEMENT OF FAMILY / WHĀNAU IN PATIENT CARE

Outcome sought: Patients experience increased engagement between hospital staff and their family/whānau in discussions about their care.

Rationale for selection: Canterbury's In-Hospital Survey result in this supporting question has historically been lower than the national rate. The Always Events project is providing a framework for Canterbury to explore various stakeholder perspectives of patient care, and through this understand and address the contributors to this result. In 2017/18 Canterbury commenced the second phase of the Always Events improvement project that includes having the details of each patient's contact person recorded and correct 100% of the time. This work will continue over 2018/19 with consumer groups involved in guiding this activity.

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Measure description: To better understand what influences the score on the In Hospital Survey result for the supporting question "Did the hospital staff include your family/whānau or someone close to you in discussions about your care?"

Numerator: The sum of the weighted average scores out of ten for this question response. Denominator: The number of responders that answered this question.

Percentage results for the question "Did the hospital staff include your family/whanau or someone close to you in discussions about your care 70% 60% 50% 40% \$ 30% 20% 10% 0% Q3 Q4 01 Q2 Q3 Q4 Q1 Q2 Q3 Q4 01 Q2 Q3 Q4 01 2014 2015 2016 2017 2018 Canterbury Total 🗕 New Zealand

Data source: The Health, Quality and Safety Commission.

#### PRIMARY CARE PATIENT EXPERIENCE SURVEY IMPLEMENTATION

Outcome sought: An increase in the proportion of general practices obtaining feedback from patients via the Primary Care Patient Experience Survey.

Rationale for selection: PHOs continue to have an important role in working with general practices to increase the number obtaining feedback from their enrolled populations. In 2018-19 Canterbury will continue to focus on general practice's engagement with the survey. Alongside this, the Primary Care Patient Experience Survey response rate will be monitored and an analysis undertaken on any cohort of respondents underrepresented.

Measure description: The proportion of Canterbury general practices participating in obtaining feedback from patients via the Primary Care Patient Experience Survey. Numerator: The number of general practices in Canterbury participating in obtaining feedback from patients via the Primary Care Patient Experience Survey.

*Denominator:* The number of general practices in Canterbury.

Data Source: Reported quarterly by the PHOs.

Proportion of general practices in Canterbury obtaining feedback from patients using the Patient Experience Survey 70% % of general practices 60% 50% 40% 30% 20% 10% 0% Q4 04 2016 2017 2018

Contributory Measure	Actions to Improve Performance	Responsibility
In-Hospital Survey Completion Rate	<ul> <li>Confirm patient procedures for the collection, verification and record management processes for communicating with patients using email and SMS.</li> <li>Continue to implement the hospital-wide procedure for the collection of patient emails.</li> </ul>	DHB Quality & Safety staff
In-Hospital engagement of family /whānau in care.	<ul> <li>Continue with Phase Two of the national Always Events pilot including working with consumers to:</li> <li>Agree the terminology and process used to collect the nominated or preferred contact person details; and</li> <li>Clarify the role of the patient's nominated contact person.</li> </ul>	DHB Quality & Safety staff
Primary Care Patient Experience Survey Implementation	<ul> <li>Continue supporting general practice with the implementation of the Patient Experience Survey.</li> <li>Assist general practice teams to interpret and use Patient Experience Survey results as part of their ongoing quality improvement.</li> </ul>	PHO Quality & Safety staff
Response Rate	<ul> <li>Monitor the Primary Care Patient Experience Survey response rate.</li> <li>Undertake an analysis of the local Primary Care survey respondents by age bands and ethnicity to identify any population cohorts that are underrepresented and establish baseline data on respondents.</li> </ul>	DHB and PHO Quality & Safety Project Group staff
In-Hospital & Primary Care Patient Experience Survey	<ul> <li>Identify a common theme across the In-Hospital and Primary Care surveys and progress a local targeted response.</li> </ul>	DHB and PHO Quality & Safety Project Group staff
Improvement in Patient Experience through increased	<ul> <li>Work with a service alliance or expert groups to trial using information from the In-Hospital and Primary Care</li> </ul>	DHB and PHO Quality & Safety Project Group

#### ACTIONS TO IMPROVE PERFORMANCE: PATIENT EXPERIENCE SURVEY

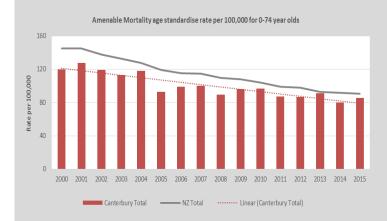
utilisation of patient feedback.		Patient Experience Survey to assist them in leading the transformation of health care in a specific service area.	
Quality Improvement through an increase in domain question scores.	•	Formalise a process for utilisation of the Patient Experience Survey information in Canterbury's education programme and/or other education opportunities. Distribute two case studies that highlight the use of survey results in change of general practice. Promotion of the Patient Experience Survey (primary and inpatient). Eg. Publication in <i>Well Now</i> .	DHB and PHO Quality & Safety Project Group staff

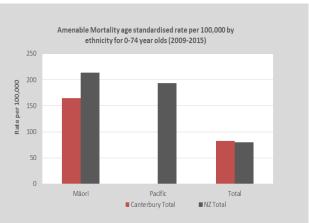
## System level measure: AMENABLE MORTALITY

#### CANTERBURY'S EXPERIENCE

Our priority is to continue to decrease the amenable mortality rate.

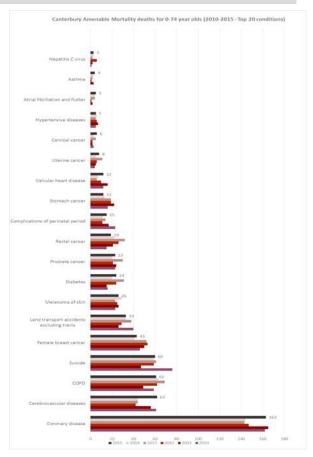
Canterbury's Amenable Mortality age standardised rate for under 75-year-olds is trending downwards, and remains consistently lower than the total New Zealand rate<sup>11</sup>. The national data provided by ethnicity indicates that all Canterbury populations have rates lower than the New Zealand rates<sup>12</sup>.





A review of the longitudinal Amenable Mortality data by cause of death identifies that a number of medical conditions contributing to Canterbury's Amenable Mortality Rate are influenced by lifestyle choices; including activity levels, nutrition and smoking. This affirms Canterbury's selection of measures linked to patients' engagement in making positive lifestyle choices. This focus on assisting people to better manage their own health aims to improve people's quality of life and reduce mortality.

Alongside this lifestyle approach, further analysis of the Amenable Mortality data is proposed during 2018/19, including consideration of the ethnicity, rate, age of death, and magnitude of trend, within each potentially amenable condition. It is anticipated that this will better position Canterbury in subsequent years to proactively target emerging diseases and those that substantially shorten life. The analysis, to date, has guided the selection of Canterbury's contributory measures and activities for 2018/19 as detailed below.



<sup>11</sup> National Minimum Data Set Amenable Mortality – Final Data to March 2015

<sup>&</sup>lt;sup>12</sup> A standardised rate per 100,000 for Canterbury Pacific people is unable to be determined due to the small number of Canterbury Pacific people recorded in this cohort.

The Canterbury Health System's agreed milestone is to maintain the current downward trend over time in the overall Amenable Mortality Rate. Applying this approach results in a milestone for the Amenable Mortality Rate at 30 June 2019 of 83 per 100,000 population.

#### CONTRIBUTORY MEASURES

The contributory measures selected include a focus on engaging people in managing their own health thereby supporting them to make positive lifestyle choices. These measures and the underlying actions are seen as being fundamental to reducing the impact of these lifestyle related conditions. In addition, two measures of smoking prevalence are added as indicators of Canterbury's progress towards being Smokefree in 2025.

#### INDICATORS OF HEALTH PROMOTING LIFESTYLE

*Outcome sought:* An increase in our population's adoption of positive lifestyle choices.

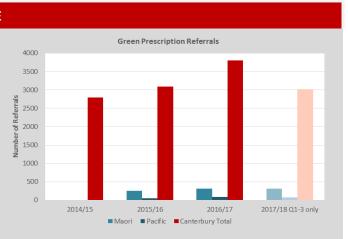
*Rationale for selection:* A range of services are available to support our population with making positive lifestyle choices. Increasing referrals to these services is an indicator of our health system assisting patients to navigate and access this support.

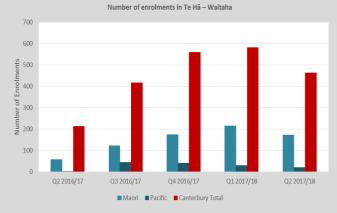
*Measure description:* Two measures; Green Prescription referrals and enrolments in Te Hā – Waitaha / Stop Smoking Canterbury service, have been selected as indicators of people accessing a wider range of lifestyle support services.

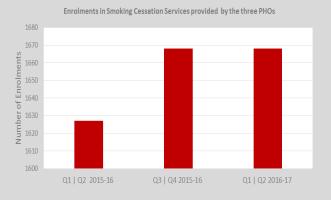
Note: From 1 October 2016 Canterbury's stop smoking service Te Hā – Waitaha, which has a particular focus on priority populations was implemented.

Data source: Provider data collected locally

*Measure description:* Alongside the Te Hā – Waitaha Stop Smoking Services all Canterbury PHOs provide their enrolled population with access to comprehensive smoking cessation support. To monitor all smoking cessation activity across Canterbury, enrolments in the PHOs smoking cessation services are included as a contributory measure alongside the Te Hā – Waitaha activity. *Data source:* Provider data collected locally







#### MEASURE OF REGULAR SMOKERS IN CANTERBURY

*Rationale for selection:* Smoking is a major contributor to amenable mortality as a risk factor for many including cancers, cardiovascular disease, stroke, chronic obstructive pulmonary disease, and sudden unexpected death in infancy. Reducing smoking through interventions in the health system can therefore contribute to reduction in amenable mortality. Two indicators of the proportion of Canterbury's population that are smokers are included below.

*Outcome sought:* A decrease in regular smokers to 5% prevalence in 2025.

#### Measure description:

The proportion of the Canterbury population who are regular smokers.

#### Numerator:

For each ethnic group, regular smokers are people who actively smoke one or more manufactured or hand–rolled tobacco cigarettes per day.

#### Denominator:

Census usually resident population, by ethnicity. *Data source:* 

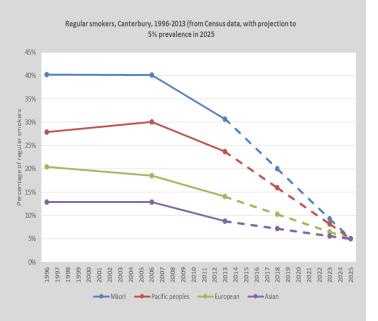
Statistics New Zealand Census 1996, 2006, 2013 data, with projections of the reduction in regular smokers needed for the proportion of regular smokers to be 5% for all ethnic groups by 2025.

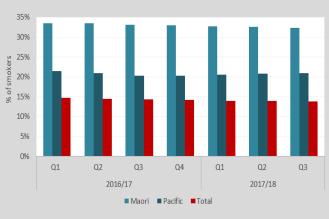
*Measure description:* The proportion of the PHO enrolled population aged between 15 – 74 years of age that are recorded as a current smoker.

*Numerator:* The number of the PHO enrolled population aged between 15 – 74 years of age recorded as current smokers.

*Denominator:* The number of the PHO enrolled population aged between 15 – 74 years of age. *Data source:* Ministry of Health.

*Note:* This measure only captures people who are enrolled in a PHO. As PHO enrolment for Māori is lower (around 80-85% in recent quarters) than other ethnic groups (around 94-97%) this measure may under or over-represent current smokers who identify as Māori.





% of current smokers 15-74 years of age enrolled in general practice

#### MOTIVATIONAL CONVERSATIONS SKILL DEVELOPMENT

*Rationale for selection:* Primary care worker's ability to apply motivating conversation skills when communicating with their patients will support patients to better manage their own health. Importantly this is also expected to influence the conversion rate (from patient referral to participation) for specialist lifestyle support such as Green Prescription. While initially this measure is focused on skill development in primary care, a shift to access measures such as 'referral to participation conversion rate', is anticipated.

Outcome sought: Increase in primary care's application of motivational conversations skills. Measure description: The quarterly and cumulative number of primary care workers (General Practitioners, Practice Nurses, Nurse Practitioners, Pharmacists and other primary health care professionals) participating in the motivational conversations training is identified as an indicator of this skill development. Data Source: Local data reported by the PHO quarterly.



## IMPROVED PHYSICAL HEALTH FOR PEOPLE EXPERIENCING MENTAL HEALTH AND/OR ADDICTION ISSUES

*Rationale for selection:* It is well known that people experiencing mental health and/or addiction issues tend to have worse physical health outcomes than their peers. Equally Well<sup>13</sup> is a programme of collaborative action to address poor physical health outcomes and reduced life expectancy of people experiencing mental health and/or addiction issues. In Canterbury, the Equally Well Committee has collated a list of physical health programmes currently being offered for people experiencing mental health and/or addiction issues<sup>14</sup>. The resource is intended for use by the sector to assist at-risk people access the appropriate supports they need to help improve physical health and/or addiction issues for free physical health visits for people experiencing mental health and/or addiction issues (Equally Well Extended Consults), also contribute to Canterbury's implementation of Equally Well. The inclusion of this measure in the System Level Measures Framework recognises, as indicated above, that people experiencing mental health and/or addiction issues have worse physical health outcomes and reduced life expectancy overall. It is an indicator of the additional mental health services being implemented in Canterbury to provide at-risk people with timely access to the right care.

<sup>&</sup>lt;sup>13</sup> https://www.tepou.co.nz/initiatives/equally-well-physical-health/37

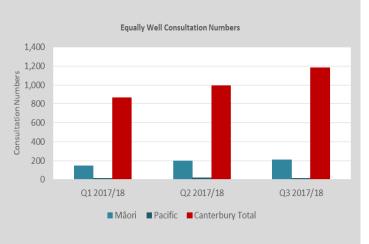
<sup>&</sup>lt;sup>14</sup> http://www.comcare.org.nz/wp-content/uploads/2017/01/Equally-Well-Physical-Health-Programmes.pdf

*Outcome sought:* Improved physical health for people experiencing mental health and/or addiction issues.

*Measure description:* The number of Equally Well Extended Consults provided quarterly across Canterbury.

*Data Source:* Local data reported directly from the PHO quarterly.

Note: Equally Well Extended Consults commenced as a pilot in December 2016.



#### ACTIONS TO IMPROVE PERFORMANCE: AMENABLE MORTALITY

Contributory Measure	Actions to Improve Performance	Responsibility
Indicators of Healthy Lifestyle	<ul> <li>Refine Te Hā – Waitaha's focus on priority populations including:         <ul> <li>Continued monitoring of enrolments and outcomes for Māori, Pacific and pregnant women; and</li> <li>Development of a targeted intervention for youth, culturally and linguistically diverse (CALD) communities and people with mental illness.</li> </ul> </li> </ul>	Population Health and Access Service Level Alliance
Motivational Conversations Skill Development	<ul> <li>Deliver 20 Motivational Conversations training events to 160 primary health care participants includes General Practitioners, Practice Nurses, Pharmacists and others.</li> <li>Complete a comprehensive evaluation of the Motivational Conversations training.</li> </ul>	Population Health and Access Service Level Alliance
ImprovedPhysicalHealthforPeopleExperiencingMentalHealthand/orAddictionImage: Second	<ul> <li>Embed consistent service criteria and specifications for Equally Well Extended Consults.</li> <li>Establish standard reporting to enable further analysis of service users and refinement of the initiative.</li> </ul>	Mental Health Workstream
All Measures	<ul> <li>Continue advocating for a healthier environment with increased opportunity for both indoor and outdoor physical activity and increased access to healthy food choices.</li> </ul>	Population Health and Access Service Level Alliance
Emerging Measure	<ul> <li>Continue work on the local pathway for bowel screening to identify if any changes in the early detection of risk factors in younger population groups are required.</li> </ul>	Project group within DHB specialist services

•	Establish a process to influence Māori and Pacific 35-44	PHO Education and
	year olds in relation to cardiovascular disease risk later	communications
	in life.	

#### System level measure:

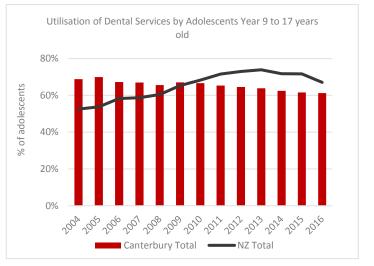
## **YOUTH ACCESS TO HEALTH SERVICES**

#### CANTERBURY'S EXPERIENCE

Our clinically-led priority focus on the 'Access to Preventive Services' domain for 2018/19 is to improve adolescent access to dental services.

In 2016 18,445 (61.3%) of the estimated 29,930 adolescents (School Year 9 to 17 years of age) in Canterbury accessed DHB funded dental services<sup>15</sup>. This utilisation rate is below the national average and has changed little over the previous ten years.

In 2017/18 Canterbury sought to increase the engagement of youth in the service by improving the Community Dental Service transfer of care process. For 2018/19 the focus will shift to strengthening the dental practices receipt of the Year 9 referrals via the transfer for care process, and work with the dental practices on their recall processes. In addition, factors



that influence youth's engagement with the service will be explored through a series of focus groups.

While Canterbury's Dental Service measure of youth access and utilisation while focused on a specific part of preventive health services, it will be used to generate lessons that could be applied more generally to young people's perception of and willingness to use services.

#### MILESTONE

The Canterbury Health System's agreed milestone is 63% of the adolescents from Year 9 to 17 years of age utilising the Canterbury DHB funded Dental Service at June 2019. Note: The current delay in the reported data are barriers to establishing a timely milestone for the 'Access to Preventative Services' domain.

#### CONTRIBUTORY MEASURES

#### **DENTAL PRACTICE SERVICE – STRENGTHEN THE TRANSFER OF CARE & RECALL PROCESSES**

*Outcome sought:* Dental practices holding a Combined Dental Agreement have a systematic process for coordinating the Year 9 transfer for care and recalling adolescents.

*Rationale for selection:* Utilisation date shows that while adolescents are transferred to Dental practices in Year 9, adolescents are not utilising the services. Determining how Combined Dental Agreement holders manage these transfers, including what systems and processes they have in place for recalling Adolescents annually for their free oral health assessment is required. This will be followed by work to establish a more consistent systematic approach to recalling Adolescents across Canterbury.

*Measure description:* Adolescents utilisation of the Adolescent Oral Health Service.

<sup>&</sup>lt;sup>15</sup> Policy Priority 12 data

Data Source: The Proclaim Payments System data linked to the Combined Dental Agreements.

#### **INCREASE UNDERSTANDING OF YOUTH'S ACCESS TO ORAL HEALTH SERVICES**

*Outcome sought:* Increased understanding of what influences adolescents accessing Oral Health services in Canterbury.

*Rationale for selection:* Alongside work to strengthen Dental practices transfer and recall processes there is a need to better understand why youth in Canterbury are choosing not at access the service and factors that could increase their utilisation. Limited research has been undertaken nationally on factors that influence adolescents' engagement with Oral Health services and a range of adolescent delivery models are in place across New Zealand. Undertaking this work locally will inform the ongoing development of a more accessible service.

*Measure description:* The number of focus groups undertaken that explore adolescents understanding of the Oral Health services, barriers to accessing and factors that would increase their utilisation of the free oral health assessments; and of a report outlining the findings.

Contributory Measure	Actions to Improve Performance	Responsibility
Strengthen the Transfer of Care and Recall Processes	<ul> <li>With dental practices exploring their transfer of care and recall processes.</li> <li>Establish a systematic guideline to recalling youth.</li> </ul>	Oral Health Service Development Group
Increase understanding of youth accessing of the Adolescent Oral Health Service	<ul> <li>Undertake further analysis of the demographics of youth accessing the Adolescent Oral Health Service through dental practices.</li> <li>Undertake a series of focus group to determine factors impacting adolescents' engagement with the service and ways to increase utilisation.</li> </ul>	Oral Health Service Development Group
System Level Measure	<ul> <li>Explore other indicators that could provide a more comprehensive picture of youth access to preventative services.</li> </ul>	Population Health and Access Service Level Alliance.

#### ACTIONS TO IMPROVE PERFORMANCE: YOUTH ACCESS TO HEALTH SERVICES

#### System level measure:

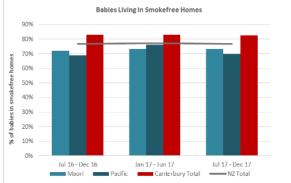
### **BABIES LIVING IN SMOKEFREE HOMES**

#### CANTERBURY'S EXPERIENCE

Our priority is to increase the number of babies living in smokefree homes and to address the ethnic variation between Māori, Pacific and total population.

At December 2017 Canterbury's percentage of Babies Living in Smokefree Homes at 6 weeks post-natal of 83% compares favourably with the national average for the Total population of 77%<sup>16</sup>. Viewed by ethnicity<sup>17</sup> Canterbury's results for the Māori population (73%) and Pacific population (70%) are lower than Canterbury's Total population.

In 2017/18 the three datasets<sup>18</sup> relating to infant exposure to cigarette smoke provided to the DHB were found to have a high number of incomplete data fields and variation between local WCTO providers in the asking and recording of smoking status and smoker presence. In response during 2017/18 Canterbury has supported the national activity to improve the data integrity by working with local WCTO providers to understand their steps for asking and recording questions of smoking status.



Alongside the work to improve the System Level Measure data

quality Canterbury has prioritised work to increase the number of babies that live in smokefree homes. In 2017/18 this included implementing a smoking cessation service that incentivises pregnant women and their family/whānau to become smoke free. This has contributed to a substantial increase in the number of pregnant women accessing specialist smoking cessation support.

This work will continue over 2018/19 with a focus on strengthening referral pathways that improve access to the service for women from our priority populations. A detailed analysis of the patient level data<sup>19</sup> that is contributing to Canterbury's System Level Measure result will also be undertaken to guide further refinement of 2018/19 actions to improve performance.

In addition, Canterbury will monitor and update baseline data on the birth weight of babies born in DHB facilities. This is considered locally to be a valuable indicator of an integrated system response to providing our pregnant women, particularly those high risk cohorts, with access to the right care.

<sup>&</sup>lt;sup>16</sup> The National Minimum Data Set for Babies Living in Smokefree Homes at May 2018.

<sup>&</sup>lt;sup>17</sup> The National Minimum Data Set for Babies Living in Smokefree Homes at May 2018 by prioritised ethnic groups.

<sup>&</sup>lt;sup>18</sup> Data from Well Child Tamariki Ora providers (1 July – 30 December 2016), Before School Checks providers (2015/16) and Lead Maternity Carers (2015/16). <sup>19</sup> Well Child Tamariki Ora datasets for Babies Living in Smokefree Homes 1 January – 30 June and 1 July – 31 December 2017

Three six-month periods of data are available for analysis in relation to babies living in smokefree homes. The equity gap for Māori:Total Population has been fairly constant over this time, however, it has fluctuated for Pacific:Total Population, likely a result of small numbers. To reduce the effect of variation and identify a milestone, the three six-month datasets were averaged.

The Canterbury Health System's agreed milestone for June 2019 is to decrease the equity gap for Māori and

 irly
 0.94

 0.92
 0.9

 for
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 0.84

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 0.84

 0.88
 0.84

 0.84
 0.82

 0.88
 0.84

 0.78
 Jul 16 - Dec 16

 Jul 16 - Dec 16
 Jan 17 - Jun 17

 Jul 17 - Dec 17

 Grow
 CDHB Equity Gap (Rate Ratio of Maori and Total)

 OCHHB Equity Gap (Rate Ratio of Pacific and Total)

Equity Gap - Rate Ratio of Maori or Pacific and Total

Pacific to 0.889 and 0.875 respectively (from an average of 0.879 and 0.865) and to continue to increase the number of infants living in smokefree homes by 30 June 2019.

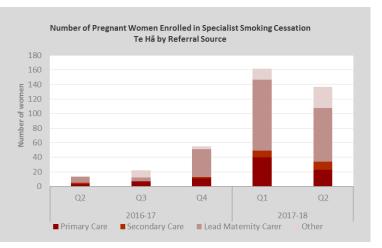
#### CONTRIBUTORY MEASURES

#### PREGNANT WOMEN ACCESSING SPECIALIST SMOKING CESSATION SUPPORT

*Outcome sought:* An increase in the number of pregnant women and their family/whānau who are smokefree. *Rationale for selection:* Engaging pregnant women and their family/whānau who are smokers in specialist smoking cessation support seeks to reduce infant exposure to harm from smoking through pregnancy, birth and in the home environment. The number of woman enrolling in Canterbury's specialist smoking cessation service is an indicator that an effective delivery pathway is in place, including:

- The referring health professional has provided help to quit, has knowledge of the specialist smoking cessation service and how to refer; and
- The provider of the specialist cessation responds in a timely way to the referral.

Measure description: The number of pregnant women enrolling in Te Hā – Waitaha / Stop Smoking Canterbury, by referrer type. Note: As Canterbury's Stop Smoking Service commenced 1 October 2016 only Q2 2016/17 data is available. Data source: Reported quarterly from Te Hā – Waitaha



#### OUTCOMES OF PREGNANT WOMEN ENGAGING IN SPECIALIST SMOKING CESSATION SUPPORT

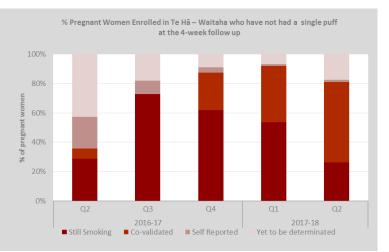
*Outcome sought:* An increase in the number of pregnant women and their family/whānau who are smokefree. *Rationale for selection:* This builds on the previous measure as an indicator of whether the women that engage in Canterbury's specialist smoking cessation service become smokefree.

*Measure description:* The smoking status of the pregnant women enrolled in Te Hā – Waitaha.

*Numerator:* The proportion of pregnant women who, at the 4-week follow–up, have not had a single puff in the previous 2 weeks; this includes smoking status that is self-reported or carbon monoxide (CO) validated.

*Denominator:* The number of pregnant women enrolled in Te Hā – Waitaha.

*Data source:* Reported quarterly from Te Hā – Waitaha.



#### ACTIONS TO IMPROVE PERFORMANCE: BABIES IN SMOKEFREE HOMES

Measure	Actions to Improve Performance	Responsibility
Pregnant Women accessing smoking cessation	<ul> <li>Strengthen the referral pathways from Lead Maternity Carers to Te Hā – Waitaha by:         <ul> <li>Developing conversation scripts to guide Lead Maternity Carer discussions on becoming smokefree with pregnant women;</li> <li>Raising the awareness of the Te Hā – Waitaha and Pregnancy Incentive programmes; and</li> <li>Reviewing the referral pathway from Lead Maternity Providers with a view to identifying ways to streamline this process.</li> </ul> </li> </ul>	Te Hā – Waitaha Steering Group and the Pregnancy sub-group of Te Hā – Waitaha
Pregnant Women accessing smoking cessation	<ul> <li>Complete the evaluation of Canterbury's Pregnancy Incentive Stop Smoking Programme and progress any feasible quality improvement steps recommended.</li> </ul>	Te Hā – Waitaha Steering Group and the Pregnancy sub-group of Te Hā – Waitaha
Improve WCTO data quality	<ul> <li>Support work nationally by working with local WCTO providers to implement the agreed data standards and definitions for the asking, recording and reporting of smoking status and smoking presence from January 2019.</li> </ul>	DHB and WCTO staff
Detailed analysis of infants in smokefree homes data	<ul> <li>Undertake a comprehensive analysis of patient level data including by age and ethnicity.</li> </ul>	Child and Youth Workstream and the Population Health and Access SLA
System Level Measure	<ul> <li>Monitor and establish baseline data for the birthweight of babies including the rate of small babies at term.</li> </ul>	System Outcomes Steering Group

## **APPENDIX ONE: OVERVIEW OF CANTERBURY'S SYSTEM LEVEL MEASURES RESPONSE**

OVERVIE	W OF SYST	EM LEVEL N	MEASURE	ES RESPO	NSE 🗸	= leading	delivery c	on the mea	sure 🔗 :	= linked /	contributin	g to deliv	very on t	he mea	sure	Update	d 30 June	e 2017.	
	Child & Youth Work Stream	Health of Older Persons Workstream	Community Services SLA	Urgent Care SLA	Pharmacy SLA	Population Health & Access SLA	Integrated Family Health Services	Clinical Quality Education	Oral Health Steering Group	Immunisation SLA	Realign / DHB Service Areas	Quality & Safety Expert Group	Project group PHOs / DHB	Pacific Reference Group	Mãori Reference Group	Consumer Council	Mental Health Work stream	Falls & Fractures SLA	Rural Health Workstream
ASH rate 0-4 year olds	✓																		
ASH rate ethnic variation	✓ Project													G	G				
Oral Health 0-4 year olds	G								✓	G				G	Ð				
New Born Enrolment	G									~			G	G	G				
Accuracy of Ethnicity Capture	G									G	G		<b>√</b>	G	G				
Acute Bed Days		Ø	Ø	✓							G								
Reduced Length of Stay		G	G	G							~								Ø
Readmission Rate		G	G	~	G						G								Ø
Polypharmacy		G			G			✓ Expert group											

	Child & Youth Work Stream	Health of Older Persons Workstream	Community Services SLA	<b>Urgent Care SLA</b>	Pharmacy SLA	Population Health & Access SLA	Integrated Family Health Services	Clinical Quality Education	Oral Health Steering Group	Immunisation SLA	Realign / DHB Service Areas	Quality & Safety Expert Group	Project group PHOs / DHB	Pacific Reference Group	Māori Reference Group	Consumer Council	Mental Health Work stream	Falls & Fractures SLA	Rural Health Workstream
Falls Prevention / Reduction in Falls		Ø									G							✓	
Pasifika Futures Engagement																			
Patient Experience of Care													✓ Expert group			G			
In-Hospital Response Rate							G				G		~			G			
*In hospital Engagement of Family & Whanau in Patient Care													✓			G			
Primary Care implementation of PES							Ð	Ð					✓			G			
Monitor / analyse local response rate, Identify common focus area and utilise feedback								G					✓						

	Child & Youth Work Stream	Health of Older Persons Work Group	Community Services SLA	Urgent Care SLA	Pharmacy SLA	Population Health & Access SLA	Integrated Family Health Services	Clinical Quality Education	Oral Health Steering Group	Immunisation SLA	Realign / DHB Service Areas	Quality & Safety Expert Group	Project group PHOs / DHB	Pacific Reference Group	Mãori Reference Group	Consumer Council	Mental Health Workstream	Midwives	Rural Health Workstream
Amenable Mortality						✓											Ø		
Green Prescription Referrals						✓													
Enrolment in Te Ha Waitaha					G	✓ Te Hā Waitaha Steering Group								G	G				
Enrolments in Smoking Cessation provided by PHOs						✓								G	G				
Motivational Conversations Skills						✓		G											
Equally Well Extended Consultations						Ð											<b>~</b>		
Youth Access to Health Services									~								✓		
Increase understanding of youth's access	Ø					Ø			✓					G	G				
Establish an Agreed Recall Process	O					Ø			~					G	G				

	Child & Youth Work Stream	Health of Older Persons Work Group	Community Services SLA	Urgent Care SLA	Pharmacy SLA	Population Health & Access SLA	Integrated Family Health Services	Clinical Quality Education	Oral Health Steering Group	Immunisation SLA	Realign / DHB Service Areas	Quality & Safety Expert Group	Project group PHOs / DHB	Pacific Reference Group	Māori Reference Group	Consumer Council	Mental Health Workstream	Midwives	Rural Health Workstream
Smokefree Infants						✓ Te Hā Waitaha Steering Group													
*Pregnant Women accessing cessation	G					✓					Maternity Servces			Ø	Ð			G	
*Outcomes of pregnant Women accessing cessation	Ð					✓					Ð			G	G			G	
Improve integrity of WCTO provider data													✓						