Report of the Director of Public Health

The Health of the Population of Forth Valley 2013-2015
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Foreword

As Director of Public Health and Strategic Planning, I am pleased to present this report on the health of the population of Forth Valley for the period October 2013 to September 2015.

This report describes the demographics and background health of our local population and highlights a number of key areas of work ongoing in NHS Forth Valley described under three main themes;

- Service improvement and development – planning, delivering and evaluating the range of interventions provided by NHS Forth Valley and partners in order to better meet the needs of the population.
- Health improvement – helping people to maximise their wellbeing by making healthy choices, and developing knowledge and skills.
- Health protection – delivering interventions that reduce the risk of communicable disease and environmental hazards.

Each section selects a number of key elements from the above three themes providing an overview of the range of work undertaken, however this report does not attempt to provide comprehensive comment on all areas of work. The report provides only a summary and overview of the vast scope of resources now readily available via the internet. Where possible the electronic version provides web-links to relevant and useful resources.

My vision for Public Health in Forth Valley focuses on the three main areas of;

- children and the early years
- ‘worthwhile work’
- substance misuse

Concentrating on these three pillars will help to improve the health and wellbeing of our local population and break the vicious cycle of challenging circumstances in the early years leading to difficulties in securing employment and the potential for increasing substance misuse.

If we can effectively deliver on these three challenges we will do much to tackle the underlying cause of inequalities and ill health, promote wellbeing and positive health including mental health. Focusing on ‘worthwhile work’ will also deliver additional benefits such as reductions in offending and reoffending. Issues associated with these pillars can form the foundation of many of the problems we see in our society. Work in collaboration with partners in these three areas will influence a much broader spectrum of health outcomes over and above those within the immediate sphere of each pillar.
The health of the population in Forth Valley is continuing to improve. Our health successes include a continuing decrease in the death rate from heart disease, stroke and cancer. As we overcome many of the more “traditional” life threatening diseases such as heart attacks, our focus of healthcare is moving towards treating and supporting people living with long term conditions (LTC). We face significant challenges with changing demographics. Our local population of over 75 year olds, for example, is set to more than double by 2037. People are living longer and are increasingly likely to be living with more than one long term condition. These factors present a huge challenge to our NHS.

In keeping with the Scottish Government, 2011 strategy; 2020 vision, NHS Forth Valley has been working, as part of our Clinical Services Review, to provide more efficient services that will help people to live longer healthier lives at home. This will be achieved through; integration of health and social care, a greater focus on prevention, anticipatory care plans and self management and a shift towards treatment in a community setting with day case treatment available when required. Care will be provided to the highest standard of quality whatever the setting. All decisions will be made with the person at the centre and the focus will be on ensuring that people are able to return to their home or community environment as soon as appropriate whilst minimising the risk of re-admission.

Following legislative change around health and social care integration, new Health and Social Care Partnerships (HSCP), will be jointly run by Integration Joint Boards who will have delegated authority from the constituent parties and have the ability to direct the NHS and Local Authority through the Strategic Plan. These will be operational by April 2016. There will be two HSCPs in Forth Valley, one for Falkirk and one for Clackmannanshire and Stirling. Currently there are Transitional Boards preparing for implementation in 2016.

We look forward to the publication of the new NHS Forth Valley Health Strategy for the next five years which will be published early in 2016 and will bring together these various strands of activity.

The 2014 Scottish Independence referendum resulted in an overall vote to remain as part of the UK. This has resulted in new powers devolved to the Scottish Government, which have the potential to be used to improve health and reduce inequalities.

Economic austerity has resulted in changes to the benefit system through welfare reform, changes in patterns of employment and reduced funding for the public sector. These factors impact on people’s health, particularly those already experiencing health inequalities. The Poverty and Income Inequality in Scotland: 2013/14 report states that 14% of children in Scotland are living in relative poverty (before housing costs) or 22% if considered after housing costs. The report from the Scottish Parliament, Welfare Reform Committee; 1st Report, 2015 (Session4); The Cumulative Impact of Welfare Reform on Households in Scotland, notes that once the welfare reforms are fully in place (around 2018) the cumulative effect is likely to see incomes reduced, on average by £440 a year, for

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1 2020 Vision
2 The Public Bodies (Joint Working) (Scotland) Act
3 Scottish Government: Poverty and Income Inequality in Scotland 2013/14
4 Scottish Parliament, Welfare Reform Committee; 1st Report, 2015 (Session4); The Cumulative Impact of Welfare Reform on Households in Scotland
every adult of working age in Scotland. Families with dependent children, in particular lone parents and those with health problems or disabilities who claim benefits are expected to experience a marked impact. The average losses in Scotland have been mitigated following the decision to maintain Council Tax benefits and to offset the ‘Bedroom Tax’.

Addressing health inequalities underpins our work. Substantial areas of Forth Valley are deprived and have high levels of behaviours and diseases associated with deprivation, for example, substance use, obesity, heart disease and cancer. For those who live in less deprived areas, health challenges include a lack of physical activity, poor diet and the environmental impacts of our 21st century lifestyle.

Further progress to improve population health will depend on our ability to work with our partners on the ‘upstream’ issues which are the fundamental causes of inequalities in health.

Dr Graham Foster
Director of Public Health and Strategic Planning, NHS Forth Valley
Facts and figures about the people living in Forth Valley

NHS Forth Valley

Around 300,000 people live in the NHS Forth Valley area. Forth Valley lies within Central Scotland and stretches from Killin and Tyndrum in the North to Strathblane and Bo'ness in the South, covering approximately 1,000 square miles (Figure 1).

The boundaries of NHS Forth Valley are co-terminus with the three Local Authorities; Clackmannanshire Stirling and Falkirk. NHS Forth Valley is a single integrated healthcare system comprising acute hospital services, and community based services which have been delivered through three Community Health Partnerships (CHPs). Retrospective data are reported under the three CHP areas.

Figure 1: Forth Valley geographic area

Source: [The Scottish Government](https://www.gov.scot)
The Scottish Public Health Observatory (ScotPHO) health and wellbeing profiles provide detailed information at Local Authority level. It is important to remember that when looking at statistics for small populations the differences are not always statistically significant; therefore it is useful to remember that longer term trends can better demonstrate the true position.

As an example of the type of information available, the estimated smoking prevalence of around 1 in 4 (25.5%) for Clackmannanshire and 1 in 5 (19.9%) in Falkirk is not significantly different from the Scottish average of 23.0%. In Stirling the smoking prevalence is less than 1 in 5 (18.5%) and is statistically significantly lower than the Scottish average. Given the importance of early years it is concerning for example that the percentage of mothers smoking during pregnancy is 25.3% for Clackmannanshire which is statistically significantly worse than the Scottish average of 20.0%.

Population by age, Local Authority and gender
The Forth Valley mid-year estimates for 2014 (Figure 2) indicate greater numbers in age cohorts 45-59 years and 30-44 years in all three Local Authority areas except Stirling where the 30-44 years age band is relatively smaller. This has implications for services such as sexual health and maternity.

Figure 2: Mid Year Population Estimate for Forth Valley by Local Authority; 2014

Source: Data extracted from National Records of Scotland
There are slightly more females than males in all three local authority areas within Forth Valley (Figure 3).

**Figure 3: Mid Year Population Estimate; 2014 by gender and Local Authority**

![Bar chart showing population by gender and local authority in Forth Valley](chart)

**Source:** Data extracted from [National Records of Scotland](https://www.nrscotland.gov.uk)

**Population projections**

Population projections indicate that the population of Forth Valley is rising faster than the Scottish average. The total population of Forth Valley is projected to increase by 10% between 2012 and 2037 compared to an increase of 8.9% in Scotland overall.

The most notable increase in population projections is within the 65 and over age cohorts where the population is expected to rise by 70.5% from 51,500 in 2012 to 87,700 in 2037, accounting for just over 1 in 4 of the population. The numbers of those aged 75 and over are projected to rise by 101.5% from 22,406 in 2012 to 45,153 in 2037 when this group will represent around 1 in 7 of the population.

“The population of Forth Valley is projected to increase by 10% between 2012 and 2037.”

Figure 4 demonstrates the projected change in the population age profile from 2015 to 2035 with the large group of those currently aged 45-55 years graduating to the 65-75 year age group in 2035, but without a corresponding increase in the younger age groups.
Figure 4: 2012-based principal population projections by sex for Forth Valley over a twenty year period (2015-2035)

Source: Data extracted from National Records of Scotland

Economic circumstances of Forth Valley people

The percentage of working age adults claiming incapacity benefit, severe disability allowance (SDA) or employment support allowance (ESA), is greatest in Clackmannanshire at 5.7% compared to either Falkirk or Stirling. Similarly the rates of income deprivation are also higher in Clackmannanshire (Table 1) 5.

Within Scotland, Clackmannanshire has the highest percentage of 16-19 year olds not in employment, education or training.

These local data are consistent with Figure 5 which highlights the areas of deprivation within Forth Valley by Scottish Index of Multiple Deprivation (SIMD) deciles with the lighter areas representing the more deprived communities.

5 SCOTPHO Health and Wellbeing Profiles
Table 1: Social care and economic data for Forth Valley by Local Authority (2013)\textsuperscript{5}

<table>
<thead>
<tr>
<th></th>
<th>Clackmannan shire</th>
<th>Falkirk</th>
<th>Stirling</th>
<th>Scotland</th>
</tr>
</thead>
<tbody>
<tr>
<td>% Working age adults claiming incapacity benefit, severe disability allowance (SDA) or employment support allowance (ESA)</td>
<td>5.7% CI: 5.5-6.0</td>
<td>4.9% CI: 4.8-5.0</td>
<td>4.0% CI:4.1-3.9</td>
<td>5%</td>
</tr>
<tr>
<td>Rate of income deprivation</td>
<td>15.4% CI: 15.1-15.7</td>
<td>12.7% CI: 12.5-12.9</td>
<td>9.9% CI: 9.7-10.1</td>
<td>13.2%</td>
</tr>
<tr>
<td>% 16-19 year olds not in employment, education or training (NEET)</td>
<td>12.1% CI: 10.8-13.4</td>
<td>8.6 % CI: 8.0-9.3</td>
<td>5.6% CI: 5.0-6.2</td>
<td>7.8%</td>
</tr>
</tbody>
</table>

Figure 5: Forth Valley Map detailing areas of deprivation by SIMD datazone

Sources: SIMD 2012, Scottish Government; Ordnance Survey data © Crown copyright and database right 2015;

“The numbers of people in the 65 and over age group is expected to rise by 70.5% between 2012 and 2037.”
Trends in common diseases

At UK level, cardiovascular disease (CVD), mainly coronary heart disease and stroke, remains a significant burden and a major cause of death. Of note, in 2012, for the first time, cancer narrowly took the lead as the foremost cause of death at 29% compared to cardiovascular deaths at 28% for both sexes together. Spilt by gender, cancer is the most common cause of death for men (32%) while cardiovascular disease remains the leading cause of death for women (28%). CVD mortality rates are higher in Scotland and the North of England compared to the South of England. Improvements in survival mean that we now experience a higher prevalence of people living with CVD with subsequent increase in relevant prescriptions.

Heart Disease
The number of premature deaths from heart disease in Forth Valley has continued to fall over the past decade. For under-75 year old males in Forth Valley, the mortality rate from ischaemic heart disease per 100,000 population has decreased substantially from 141.3 to 89.1, between 2004 and 2013. For females of the same age range, the rate per 100,000 population has decreased from 44.8 to 27.2. The combined rate per 100,000 population for both sexes has fallen from 93.1 to 58.1, during the same period (Figure 6).

The reduction in premature deaths from ischaemic heart disease reflects a position where more people are surviving and living with the disease. This has resulted in an increased need for treatment and healthcare as the population ages.

Figure 7 demonstrates the differences in mortality (deaths) from coronary heart disease (CHD) across the deprivation quintiles. There has been a reduction in mortality in all the deprivation quintiles over the decade 2004-2013 with a greater reduction observed in CHD mortality rate among the least deprived quintile (46.4%) compared to the most deprived quintile (40.7%). The absolute difference in mortality rate per 100,000 population, between the most and least deprived quintile has decreased from 152 to 102 over the last decade.

Although the situation is improving for all the population it is disappointing that the most deprived quintile are only now experiencing the level of mortality which the least deprived groups achieved 10 years ago.

Figure 6: Age-sex standardised mortality rate per 100,000 population\textsuperscript{1} for coronary heart disease in under 75 year olds by year of death, Forth Valley residents; 2004-2013

Source: Data extracted from NHS National Services Scotland: Information Services Division

1. The European Standard Population (ESP), which was first used in 1976, was revised in 2013. Figures using ESP1976 and ESP2013 are not comparable.

Figure 7: Coronary heart disease\textsuperscript{2} deaths by deprivation (SIMD) quintile\textsuperscript{3}
2013 European age and sex standardised mortality rates per 100,000 population\textsuperscript{3}

Source: Data extracted from NHS National Services Scotland: Information Services Division

1. Analysis includes ICD-10 codes I20-I25
2. Uses 2012 version of SIMD
3. The European Standard Population (ESP), which was first used in 1976, was revised in 2013. Figures using ESP1976 and ESP2013 are not comparable.
Stroke

The number of deaths from stroke has fallen during the past decade. Deaths for 65-74 year olds in Forth Valley, from 2004 to 2013 are shown in Figure 8. This age cohort is a high risk group for stroke compared to younger age groups and demonstrates mortality rates reducing from 168.5 per 100,000 population in 2004 to 95.1 per 100,000 population in 2013.\(^7\)

Figure 8: Age-sex standardised mortality rate per 100,000 population\(^1\) for stroke in 64-75 year olds by year of death, Forth Valley residents; 2004-2013

Source: Data extracted from NHS National Services Scotland: Information Services Division

1. The European Standard Population (ESP), which was first used in 1976, was revised in 2013. Figures using ESP1976 and ESP2013 are not comparable

The Scottish Government’s 2009 action plan\(^8\) reiterated their earlier target to reduce premature mortality among all those under 75 years from stroke, by 50%. At Scottish level, between 1995 and 2010 there was a 59% reduction in the mortality rate for cerebrovascular disease, with a corresponding 56% reduction in Forth Valley.\(^9\)

\(^7\) ISD Scotland, Stroke, Topic areas, mortality
\(^8\) Scottish Government: Better Heart Disease and Stroke Care Action Plan (2009)
\(^9\) ISD Scotland, Stroke, Background and Policy
Cancer
Within Forth Valley, between 1995 and 2013, the number of deaths from all cancer types has shown a downward trend (Figure 9).

Figure 9: Trends in mortality from all cancer types including non-melanoma skin (ICD-10 C00-C97)
Forth Valley; persons under 75, 1995-2013

![Graph showing mortality trends from all cancer types including non-melanoma skin (ICD-10 C00-C97) in Forth Valley, 1995-2013. The graph shows a downward trend over the years.](image)

Source: Data extracted from [NHS National Services Scotland: Information Services Division; Cancer Statistics](http://www.nhseis.scot.nhs.uk)

1. The European Standard Population (ESP), which was first used in 1976, was revised in 2013. Figures using ESP1976 and ESP2013 are not comparable.

Although there has been an overall downward trend there continue to be marked differences in the rate of new cases of cancer and deaths from cancer between deprivation groups. In the most deprived areas, rates for all new cancers combined are almost a third higher than those seen in the least deprived areas. Mortality rates are over two-thirds higher in the most deprived areas compared with the least deprived areas. Figure 10 illustrates the correlation of new cancers and deaths from cancer across the deprivation groups.

Certain cancers are more strongly correlated with deprivation. Cancers associated with smoking have the highest incidence (new cases) and mortality rates in deprived areas. Cervical cancer reflects socio-economic differences in exposure to risk factors and lower attendance at cervical screening for women from more deprived areas. Other cancers such as breast cancer and malignant melanoma are associated with a higher incidence in the least deprived areas.10

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10 Information Services Division: [Cancer Mortality in Scotland (2014)](http://www.nhseis.scot.nhs.uk)
Figure 10: Cancer\(^1\) Incidence (2009-2013) and Mortality (2010-2014) by deprivation quintile\(^2\) in Scotland. Age-standardised rates\(^3\)

Source: ISD, Cancer Mortality in Scotland (2014); Scottish Cancer Registry, ISD (registrations): National Records of Scotland (deaths)

1 All cancers excluding non-melanoma skin cancers (ICD-10 C00-C97 excl C44).
2 Deprivation quintile based on SIMD 2012.
3 The European Standard Population (ESP), which was first used in 1976, was revised in 2013. Figures using ESP1976 and ESP2013 are not comparable.

**Diabetes**

The Scottish Diabetes Survey 2012 reported that the number of people with diabetes continues to increase by around 10,000 each year. This increase in new cases against a background of those continuing to live with diabetes presents greater organisational and resource pressures\(^{11}\).

The 2012 age adjusted prevalence of all types of diabetes across Scotland, using the Scottish population as the reference population structure, ranged from 4.14% to 5.46% with the prevalence in Forth Valley sitting at 5.05%. This represents 14,850 people. The prevalence of diabetes is particularly high among those aged 65 and over, with a crude prevalence in Forth Valley of 15.5%, (Scotland; 15%)\(^{11}\).

The majority of patients registered with diabetes in Forth Valley had type 2 diabetes (13,091 or 88.2%), a condition mostly affecting the older population. The number of patients with type 1 diabetes continues to rise each year reflecting the rising incidence of type 1 diabetes in children over the last 40 years.\(^{11}\)

Of those patients with type 1 diabetes and a recorded BMI, 38% were overweight (BMI 25-30kg/m\(^2\)) while 25.5% were obese (BMI 30kg/m\(^2\) or above). Similarly for those with Type 2 diabetes and a registered BMI, 31.6% diabetes were overweight (BMI 25-30kg/m\(^2\)) and 55.5% obese (BMI 30kg/m\(^2\) or above.\(^{11}\) Almost 1 in 5 people with diabetes were recorded as being a current smoker\(^{11}\).

\(^{11}\) NHS Scotland, Scottish Diabetes Survey 2012;Scottish Diabetes Survey Monitoring Group
Service Improvement and Development

Health and Social Care Integration

The Public Bodies (Joint Working) (Scotland) Act\(^{12}\) was granted royal assent on 1\(^{st}\) April 2014. This presents the framework for integrating health and social care in Scotland through;

- integration of adult health and social care budgets
- nationally agreed outcomes applying across health and social care for which NHS Boards and Local Authorities will be jointly accountable
- a stronger role for clinicians and care professionals along with third and independent sectors in the planning and delivery of services

In Forth Valley work is underway to develop the local vision around local health and social care integration. The current vision\(^{13}\) is:

*to enable people to live full and positive lives within supportive communities.*

Work will focus on measures to drive:

- Self Management - individuals, their carers and families are enabled to manage their own health, care and wellbeing
- Community Focused Supports – supports are in place, accessible and enable people, where possible, to live well for longer at home or in homely settings within their community
- Safety - health and social care support systems help to keep people safe and live well for longer
- Autonomy and Decision Making - individuals, their carers and families are involved in and are supported to manage decisions about their care and wellbeing
- Experience –individuals will have a fair and positive experience of health and social care

From April 2016, there will be an Integrated Joint Board (IJB) for each health and social care partnership within Forth Valley; one for Falkirk and one for Stirling and Clackmannanshire. These will oversee the planning, management and delivery of relevant health and social care services.

Clinical Services Review

A Clinical Services Review for NHS Forth Valley has been underway since 2014, to inform the healthcare strategy (2016-2020) in setting out our plans and priorities. In 2011, the Christie Commission\(^{14}\) noted the need for a change in the design and delivery of public services to tackle the root causes of inequality and move away from the high levels of “failure demand”. This term

\(^{12}\) The Public Bodies (Joint Working) (Scotland) Act
\(^{13}\) NHS Forth Valley Health and Social Care Integration Scheme
\(^{14}\) Christie Commission
describes the situation when a high proportion of public spending is spent on dealing with demand that could have been avoided by earlier preventative measures. This work needs to be done by empowering and working more closely with individuals and communities, harnessing their talents and assets, supporting self reliance and community resilience. The report further notes the need to integrate services, prioritise negative outcomes, reduce duplication and share services in order to improve efficiency.

The Clinical Services Review (CSR) aims to reshape services to meet the needs of a rapidly ageing population, manage increasing demand for health services particularly for people with longer term and complex needs and deliver more care at home or in local communities so patients can retain their independence, surrounded by family and friends.

As part of this, the Forth Valley Case for Change\textsuperscript{15} details the future trends in the size and age of our local population alongside social factors affecting health and wellbeing, estimating future service activity and forecasting future levels of several common diseases and long term conditions. Demand for healthcare services is exceeding supply in our current model and the analysis in the Case for Change helps inform planning and service delivery to meet future local healthcare needs, keep pace with demand and deliver a safe, effective, person-centred care, to promote population health improvement and to maintain financial balance as detailed in the NHS Scotland \textit{2020 Vision}\textsuperscript{16}.

The CSR has eight workstreams, covering the majority of all clinical work, including planned and unscheduled care, topics such as cancer, long term conditions and end of life care, client groups such as women and children and frail older people and clinical support services and infrastructure. Each workstream has a clinical and managerial lead with planning support. There has also been considerable public and staff consultation resulting in over 500 individual public, patient and staff responses, more than 60 meetings with key patient groups, staff postcards and suggestion boxes, focus groups, four public open meetings, 50 work stream meetings and over 2000 specific items of feedback.

The key enablers from both the public and staff were remarkably similar as shown in Figure 11. Delivering a person centred approach and ensuring appropriate access were identified as the main issues. These were followed by the need for continuous, coordinated and integrated care, improved communication and attitude, and the need to address capacity issues.

\textsuperscript{15} Forth Valley; Case for Change 2014
\textsuperscript{16} Scottish Government: 2020 Vision
The main strategic themes emerging from this consultation focus on person centeredness and integration. Care should be provided in high quality settings as close to home as possible. Staff should be developed for more generic roles working in multidisciplinary community teams based within the locality and formally involving the third sector.

Multidisciplinary teams should facilitate self care and anticipatory care planning and patients will be discharged and assessed in their own surroundings, reducing delayed discharges and improving patient flow through the hospital. End of life care should focus on ensuring that patients end their
days in the most appropriate setting. Services, approaches and workforce need to be more integrated, run across seven days and utilise more IT and technology solutions wherever suitable. Mental health services are important and will receive at least the same priority as those addressing physical health. Prevention needs to be delivered across a range of interventions from the basic aspects of the physical and social environment through to the most highly technical surgical and medical treatments.

A key priority is to ensure services are person centred. This means that individuals should be engaged – with their own health, services and society in general and enabled to help themselves, and make positive changes and improvement that will impact on health and wellbeing.
Health Improvement

A wide range of initiatives are delivered under the heading of health improvement. Those targeting children and young people currently have our highest priority. Substance use, prison health and oral and dental health and working with communities are also key areas of local work.

Early Years Collaborative 17

The Early Years Collaborative (EYC) is an initiative launched by the Scottish Government in October 2012, with the ambition of ‘making Scotland the best place in the world to grow up for all babies, children, mothers, fathers and families’ (SG 2013). It is the world’s first multi-agency quality improvement programme, involving social services, health, education, police and third sector professionals in all 32 Community Planning Partnerships and a wide range of national partners. Its focus is on strengthening and building on services, using an improvement science methodology; the PDSA cycle – Plan, Do, Study Act (Figure 12). This method enables local practitioners to test (through ‘tests of change’), measure, implement and scale up new ways of working to improve outcomes for children and families, across four workstreams.

Figure 12: PDSA cycle

Each of the four workstreams have an aim relating to a particular age and stage in the early years. Numerous ‘tests of change’ have been carried out including; antenatal booking, healthy start vitamins, communications systems and attendance at 27-30 month reviews - resulting in many positive outcomes. Some examples are listed below. NHS Forth Valley is closely involved in the EYC and is currently expanding its tests of change.

Workstream 1: Conception to one year

The aim of this workstream is to ensure that from 2010 to 2015, women experience positive pregnancies, resulting in the birth of more healthy babies as evidenced by a reduction of 15% in the rates of stillbirths and infant mortality.

Forth Valley’s maternity services set and achieved the aim of ensuring that, by October 2014, 80% of all newly pregnant mothers had registered with the service by the 10th week of pregnancy for ongoing support and care.

17 Image taken from http://www.earlyyears collaborative.co.uk/about-the-collaborative
Workstream 2: **One year to 30 months**

The aim of this workstream is to ensure that by the end of 2016, 85% of all children have reached the expected developmental milestones at the time of the child’s 27-30 month child health review.

Forth Valley’s Health Visitors are linking with Child Health to help reduce the number of incomplete review documents requiring follow up.

Workstream 3: **30 months to primary school**

The aim of this workstream is to ensure that by end of 2017, 90% of all children have reached the expected developmental milestones at the time the child starts primary school.

Communication impairment is the most common developmental difficulty in early childhood. In Forth Valley, it was identified as the highest area of new concern, at over 10%, at the Health Visitor 27-30 month review. The actual figure is likely to be higher than this as the data only include the families who attended.

In Stirling, LIFT is a universal, asset-based approach offering families living in disadvantaged areas the chance to acquire knowledge and skills to improve the quality of their everyday interactions with their child. This in turn will have positive effects on spoken language development and improved life outcomes.

The project has initially been piloted in year one in three nurseries in three phases and will be extended to a further two nurseries in year two.

Workstream 4: **Start of primary to the end of Primary 4**

The aim of this workstream is to ensure that by the end of 2012, 90% of all children have reached the expected developmental milestones and learning outcomes by the end of Primary 4.

Forth Valley is supporting the roll-out of the ‘Daily Mile’, an exercise intervention from St Ninian’s Primary school to other schools in Forth Valley. “The Daily Mile can do more for the health of children than any other healthcare system” (Maureen Bisognano, CEO, Institute for Healthcare Improvement)

**Leadership**

Supporting the four workstreams is a leadership strand that takes a strategic overview of all activity and provides direction. In Forth Valley there are two leadership groups, one covering Falkirk and the other covering both Clackmannanshire and Stirling.
Oral and Dental Health

A key priority in recent years has been to improve the dental health of local children. Scotland has a poor history of dental ill health; childhood dental extractions have for many years been the most common reason for a child requiring a general anaesthetic.

Forth Valley continues to meet its annual target for the proportion of children in Primary 1 (P1) and Primary 7 (P7) with no apparent decay, with 66% of P1 and 67% of P7 free of obvious tooth decay (Figure 13). These improvements in oral health are closely associated with the development of the Childsmile programme (www.child-smile.org) which has been developing and evolving since 2006. The programme integrates four elements providing oral health packs to young children, toothbrushing programmes in all nursery establishments and targeted primary schools. This is supplemented by fluoride varnish applications in nurseries and primary schools in the more disadvantaged areas; currently 28% of nurseries and 25% of primary schools. The improvement in children’s dental health has seen falls in the number of fillings and extractions required with a substantial fall in the number of dental general anaesthetics being required from an average of 50 per month in 2009 to 20 per month at the end of 2014.

Figure 13: The proportion of Primary 1 (P1) and Primary 7 (P7) children in Forth Valley free of obvious dental decay 1987-2014

Source: Data from NHS Scotland National Dental Inspection Programme

2014 saw the publication of an updated SIGN guideline on dental interventions to prevent caries in children which was chaired by one of our Dental Public Health Consultants.

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18 Dental Interventions to prevent caries in children: SIGN guideline
In 2015 an Orthodontic Needs Assessment for Scotland\textsuperscript{19} was published. This group was chaired by one of our local consultants in Dental Public Health.

The Caring for Smiles\textsuperscript{20} programme for those in care homes was rolled out in Forth Valley in 2013 and has promoted additional activity in and around dental care provision within a residential care framework. Public dental service staff are supporting the training and delivery of individual oral care plans for all of Forth Valley care home residents. To date, 1,149 carers have received specific training and 73 facilities have participated. Later this year a new SCQF (Scottish Credit & Qualifications Framework) rated qualification will be available and our staff are currently undergoing training to deliver this to care home staff.

In addition a wide range of oral health improvement programmes continue to run in schools, pharmacies, the workplace, in prisons and with other vulnerable groups.

**Substance Use**

The Forth Valley Alcohol and Drug Partnership (ADP) is chaired by the Director of Public Health who is also the local champion for Recovery Orientated Systems of Care (ROSC).

The Forth Valley ADP commissioned Public Health to produce a Substance Use Healthcare Needs Assessment. This document details the health effects, and impact on healthcare services, of alcohol, drugs and tobacco use by the people of Forth Valley.

**Alcohol**

Drinking too much alcohol is harmful to health and is estimated to cause around 20 deaths per week in Scotland.\textsuperscript{21}

**Alcohol-related deaths in Scotland**

- There were 1,100 alcohol-related deaths in 2013 (where alcohol was the underlying cause of death)\textsuperscript{21}.
- 741 of those deaths were men, 359 were women\textsuperscript{21}.

\textsuperscript{19} NHS Scotland, Scottish Dental; An orthodontic needs assessment report

\textsuperscript{20} NHS Health Scotland: Caring for smiles- A guide for carers

\textsuperscript{21} National Records for Scotland(NRS).
Over the years since 1979, there have been roughly twice as many male deaths as female deaths. 472 deaths were people aged 45-59, 359 deaths in the 60-74 age group, 164 deaths in the 30-44 age group, and smaller numbers for other age groups. The 45-59 age group has had the largest number of alcohol-related deaths in almost every year since 1979. Although alcohol-related deaths have declined in recent years, rates remain higher than they were in the early 1980s and higher than those in England and Wales.

The decline in alcohol related deaths during the past decade is evident for the whole of Scotland although for individual Boards it is less obvious due to small numbers and wide confidence intervals. See Figure 14.

**Figure 14: Number of alcohol related deaths by year 1979-2013: Scotland vs Forth Valley**

Alcohol is classified by the International Agency for Research on Cancer (IARC) as a group 1 carcinogen, meaning it can cause cancer in humans. Tobacco and asbestos are other substances in this group. It is a recognised risk factor in a significant number of different cancers including: the breast, liver, bowel, mouth, throat, larynx (voice box) and oesophagus. It's estimated that alcohol is responsible for around 4% of cancers in the UK, about 12,800 cases a year.

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22 MESAS 4th Annual Report
23 Parkin, DM, Cancers attributable to consumption of alcohol in the UK in 2010: British Journal of Cancer (2011) 195, S14-S18
During pregnancy, current advice is that the safest approach is not to drink alcohol at all. Alcohol can affect the developing fetus with a wide range of differing impacts including lifelong conditions, known under the umbrella term of Fetal Alcohol Spectrum Disorders (FASD). The level and nature of the conditions under the term FASD relate to the amount drunk and the developmental stage of the fetus at the time. Heavy drinking can cause the baby to develop fetal alcohol syndrome (FAS). This is a serious condition where children have restricted growth, facial abnormalities and learning and behavioural disorders, which are long lasting and may be lifelong. Current advice is that the safest approach is not to drink alcohol at all during pregnancy.

A number of steps have been taken nationally to try and reduce the unacceptably high level of alcohol consumption in Scotland, thereby reducing the harm caused by alcohol. This is a complex challenge which requires public agencies to work jointly with the alcohol producers and retailers.

One of the aims is to reduce the amount of alcohol being drunk through making alcohol more expensive. The Alcohol (Minimum Pricing) (Scotland) Act 2012\textsuperscript{24} was passed on 24 May 2012. Its implementation has been delayed by the legal challenge led by the Scotch Whisky Association which opposes the Scottish Government’s bid to charge a minimum price for alcohol of 50p a unit. This matter was referred to the European Court of Justice.

On December 5, 2014, the Road Traffic Act 1988 (Prescribed Limit) (Scotland) Regulations 2014\textsuperscript{25} introduced lower limits for blood alcohol when driving, from 80mg to 50 mg in every 100 ml of blood, bringing Scotland into line with most other European countries. This is anticipated to reduce the number of fatalities and injuries sustained in traffic accidents.

At a local level a representative of the Health Board, usually Public Health is a statutory member of the local Licensing Forum which is run by Local Councils. We contribute to guidance produced by the forums as well as having the opportunity to object to individual license applications submitted to the local Licensing Boards. Despite the best of intentions it can be difficult to influence local licensing decisions due to commercial interests.

\textsuperscript{24} The Alcohol (Minimum Pricing) (Scotland) Act 2012
\textsuperscript{25} The Road Traffic Act 1988 (Prescribed Limit) (Scotland) Regulations 2014
Smoking

Perhaps the most successful public health measure in recent times has been the adoption of legislation to ban smoking in public places which has seen a significant change in public attitudes and behaviours. Further legislation introduced in April 2013 is the Tobacco Display Regulations (Scotland)\textsuperscript{26}, which requires large shops to cover up tobacco products (cigarettes, cigars and rolling tobacco) to reduce children and young people’s exposure to tobacco products; this was extended to include small shops from April 2015.

In line with the Scottish Government Strategy; hospital grounds are to be smoke-free from March 2015. This has proved difficult to implement and we await further legislation to make this enforceable.

The Scottish Government issued guidance to NHS Scotland and the Local Authorities in 2005 encouraging them to demonstrate leadership in implementing smoking policies and promoting smoke-free lifestyles. This was subsequently re-enforced in the Health Promoting Health Service HPHS, CEL (1) 2012.\textsuperscript{27}

In 2013 the Scottish Government published a new tobacco strategy 'Creating a tobacco-free generation: A tobacco control strategy for Scotland 2013'\textsuperscript{28}. This sets out action requiring all NHS Boards to implement and enforce smoke-free hospital grounds by 31 March 2015. In response to this NHS Forth Valley appointed a Tobacco Control Officer to help reduce smoking at hospital entrances and grounds, by staff, patients and visitors. The post covers Forth Valley Royal Hospital, Clackmannanshire Community Healthcare Centre, Falkirk Community Hospital, and Stirling Community Hospital. Achieving smoke free NHS grounds has proved difficult to implement although we continue to ask the local smokers to respect our smoke-free policy we await further legislation to make this enforceable.

The mental health unit at FVRH is currently working towards the unit being smoke free within the same time frame in partnership with staff and patients.

A report on NHS smoking cessation service statistics contains data for the calendar year 2012. NHS Forth Valley continues to meet HEAT targets in terms of numbers of people stopping smoking within four weeks of setting a quit date with 61% of those quitting (self reported) coming from the 40% most deprived communities. 19% of pregnant smokers are attempting to quit using NHS cessation services. These figures support research which has found that smoking cessation services are effective in reaching deprived communities.

\textsuperscript{26} Tobacco Display Regulations (Scotland) 2013
\textsuperscript{27} Health Promoting Health Service CEL(2012) 01
\textsuperscript{28} Creating a Tobacco-Free Generation, A Tobacco Control Strategy for Scotland
A new HEAT target was set for NHSScotland to deliver universal smoking cessation services to achieve at least 12,000 successful quits, at 12 weeks post quit, in the 40% most deprived within-board SIMD areas (60% for island health boards) over 1 year ending March 2015. For NHS Forth Valley this challenging target proved unachievable but local services are now on track to deliver the further revised 2015-16 target.

More information on HEAT targets can be found on the Scottish Government website.

**Prison health**

The NHS has had responsibility for prison healthcare since 2011, requiring prisoners to have access to the same quality and range of healthcare services as members of the public. With three prisons, (HMP Cornton Vale, HMP Glenochil and HMYOI Polmont), within its geographical boundary, NHS Forth Valley has responsibility for the healthcare needs of 26% of the total Scottish prison population.

Independent Advocacy services are now available in all three prisons within NHS Forth Valley following a Public Health Review of the Need for Independent Advocacy within Forth Valley Prisons29 commissioned by the Forth Valley Prison Healthcare Liaison Group. The needs assessment highlighted the extent of mental health need and requirement for Independent Advocacy under the Mental Health (Care and Treatment) (Scotland) Act 200330. The National Prisoner Healthcare Network- Mental Health Report31 further emphasised the importance of Independent Advocacy for those in and leaving prison. This is a joint responsibility between the local Health Board and Local Authority.

![Photo of two men and a woman in a prison setting](image)

The Public Health Officer, in NHS Forth Valley, has worked with the Criminal Justice Authority at a national level on a scoping exercise covering all Independent Advocacy providers for all prisons in Scotland. This led to the development of a model of implementation for all NHS Boards who have prisons within their boundaries. The final report will be published in November 2015.

As part of an overall programme to reduce health inequalities and reoffending, NHS Forth Valley has been working in partnership with the Scottish Prison Service and the Community Justice Authorities in Forth Valley to improve offender health. In our three prisons this is being undertaken through a whole prison approach which advocates that when improving health and wellbeing in prison everyone has a role, not solely those with the responsibility for providing healthcare. It recognises that the risk factors for poor health are interrelated and best tackled

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29 A Review of the Need for Independent Advocacy within Forth Valley Prisons
30 Mental Health (Care and Treatment) (Scotland) Act 2003, section 259 (4)
31 National Prisoner Healthcare Network- Mental Health Report
through comprehensive, integrated programmes in the context and places where people live their lives.

Offending and poor health and wellbeing are closely linked with social and economic problems. Poor oral health is more common in the most disadvantaged individuals, a greater proportion of who enter our criminal justice system. NHS Forth Valley has worked to improve oral health through measures such as increasing dental hygiene measures, encouraging dental registration on release and increasing access to fresh fruit and vegetables. Successful programmes have been established to provide offenders with the skills and knowledge to cook healthy nutritious meals and this is further supported in the community by Criminal Justice Social Work.

One of our Dental Public Health Consultants has published work on improving dental health in prisoners32.

For 2015-16 a local team has begun pioneering research to establish the prevalence of tuberculosis (TB) in the Scottish prison population. The local BBV and sexual health MCN (Managed Care Network) is working hard to identify and treat Hepatitis C in prisoners.

32 Scottish Oral Health Improvement Prison Programme (SOHIPP)
The Value of Community
Working with communities through focussing on their existing strengths and capabilities, encouraging people to take control of their own health; and promoting self esteem and coping skills can help buffer and protect against life’s stresses and prevent ill health33.

Asset based approach
A health ‘asset’ has been defined as “any factor or resource which enhances the ability of communities and populations to maintain and sustain health and wellbeing and to help reduce health inequalities”34. This can include skills, knowledge and connections as well as the physical and economic resources of local places, businesses and organisations. In summary, an ‘asset based’ approach can be thought of as redressing the balance from needs towards strengths.

Within Forth Valley asset based community development first started in Hawkhill, Alloa. The success of this work has been presented at a national meeting to the Scottish Government and other Health Boards. Other asset based work is ongoing in several communities within Forth Valley.

Hawkhill
Since the introduction of the asset based approach in Hawkhill, there have been many new initiatives including the; “Man Up “group set up by men in the area to support each other, a community garden, a school walking bus, homework clubs, fitness classes, groups for mothers and a ’nifty fifties’ club. Further benefits have been gained through work with other agencies, e.g. Job Centre Plus have provided laptops to the job club in response to demand. A local Christmas card initiative for older people provided an opportunity to include information from the Fire Service encouraging uptake of safety checks. As a consequence of the asset based work in Hawkhill Community Centre, participation has risen three to four fold.

Close working with local authority colleagues has resulted in significant housing improvements included replaced boilers/radiators, increased loft insulation and provision of cavity wall insulation.

Initially the local population have prioritised issues such as safety and fear of crime. Calls concerning anti-social behaviour to the police in the area appear to have dramatically reduced and local residents report feeling a considerable improvement in community spirit and reduced fear of crime. For example, there were six calls to police regarding anti-social behaviour in the first three months of 2013 compared to 46 calls in one month alone during the previous year.

Fallin
A similar asset based community project is also underway in Fallin, a former mining village to the East of Stirling. Health improvement staff are working to engage with the local population and address health issues where possible.

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33 Annual Report of the Chief Medical Officer 2009
Camelon

‘Our Place’ is a place-based initiative funded by the Big Lottery which currently has a five year project in Camelon. The project aims to empower local people and organisations to bring about a lasting positive difference to their neighbourhood using an asset-based community development approach.

Public health is working with health providers, other local agencies and the local community to support this project. The aim is to make a long-lasting difference to those with most need in order to try and reduce inequalities. An event was held for health and other agencies and members of the community to explore local strengths and weaknesses and develop ideas to take forward. Local people in Camelon and those working in the area are taking part in a community survey to determine their local priorities. Subsequent to this, local groups and organisations in Camelon have been able to apply for funding for projects that are in keeping with achieving the ‘vision’ developed from this community survey.

Keep well

Keep well Forth Valley is a key part of the general health improvement/ health inequalities programme in Forth Valley and delivers NHS and partner agency aims on: reducing inequality (whether related to deprivation, gender, ethnicity or other,) implementing an assets-based approach, providing person-centred care, integrating health and social care and improving employability. The programme is focussed on a co-production approach through whole-person enablement and empowerment.

Keep well delivers more than 3,000 health assessments per year (equivalent to 2.3% of the local population aged 40-65), mainly to people living within areas of relative deprivation.

Individuals are invited to accept a health assessment with the experienced specialist team and subsequent consultations take a holistic, comprehensive and structured approach. These may identify a wide range of health and wellbeing associated issues with a focus on employability and men’s health, identifying opportunities for improvement.

Key themes continue to be - ethos and approach, complexity (recognising and accommodating it), empathy and compassion, innovation and application of a new, unique approach, the importance of giving time; and underpinning it all, an approach based on values and principles.

Outcome reviews are now a standard feature of the Keep well process. These reviews have shown that significant behaviour change can be achieved following the Keep well assessment.
Examples of health improvement work

Healthy weight
As the population both and enjoys improved life circumstances, health challenges such as obesity are becoming increasingly prevalent. In some areas of Forth Valley more than half of adults are clinically overweight or obese. Although NHS Forth Valley does provide a range of clinical supports and interventions for obesity our main priority is to try and focus on the importance of prevention and lifestyle change to reduce obesity at a population level. Adults are encouraged to make use of established and proven weight loss programmes and techniques and supported by our healthy weight website: “Choose to Lose”

We support a wide range of measures to focus public attention on healthy eating and exercise.

In Forth Valley the Child Healthy Weight (HEAT 3) Target has been delivered primarily through the Max in the Middle and Max in the Class programmes designed by the INTERACT team, Health Promotion Services. This work complements ongoing work to support the Curriculum for Excellence Health and Wellbeing experiences and outcomes.

The Max programmes are innovative schools based child health interventions using interactive health promotion to deliver potentially lifelong health benefits to local children in Forth Valley. The programmes aim to empower and educate primary school children in relation to healthy eating, physical activity and life choice using a non-judgmental whole class approach which is memorable, exciting and non-stigmatising.

Between October 2013 and March 2015 the Max programmes were delivered to over 80 primary school classes (approx 2,000 young people) in the Forth Valley area with priority given to schools with a high proportion of free school meals.

The Max in the Middle intervention is a one week ‘whole class’ programme for primary 6 or 7 which delivers 18 hours of experiential learning on health and well being, promoting enthusiasm and parental engagement whilst limiting stigmatisation. Dance and drama specialists work in small teams with the class teacher.
Parents made the following comments after their children took part in the Max in the Middle Programme in November 2014 and are indicative of the ‘ripple effect’ from the classroom experience to the home.

“My daughter’s attitude and emotions were different, she appeared to be both inspired and motivated by the programme.”

“Started having breakfast before school.”

“Wanted to cook and make at home what they had learnt on ‘Tasty Tuesdays.”

“It was easier to get him to go outside and play instead of constantly being in the house.”

The Max in the Class intervention is focused on staff development for primary 5 and 6 teachers who are then supported in delivering a six session intervention that is incorporated into the ongoing curriculum.
Health Protection

The work of the Health Protection Team is an important function, providing a 24 hours a day, seven days a week service to protect the local population by ensuring the safety and quality of the general environment including food, water and air, preventing the transmission of communicable disease and managing outbreaks and other incidents which threaten public health.

Statistics and data on the detection and prevention of communicable diseases are available on the Health Protection Scotland website.

Protecting the population from Tuberculosis

Amidst concern that tuberculosis (TB) is increasing and that the epidemiology of the disease has changed, the Scottish Government published the TB Action Plan for Scotland 2011 which made several recommendations to improve surveillance, diagnosis and prevention of the disease.

Since 2005 BCG Immunisation programme has been provided to people who are at risk of TB, living in Forth Valley. The key part is a neonatal programme aimed at protecting those children most at risk of exposure to TB. Although identification of these children can be challenging, all children at risk should be given a BCG and local processes are in place to assist with identifying them.

A Public Health led clinic was set up in April 2013 in Forth Valley Royal Hospital for administration of Mantoux testing and BCG and for assessing contacts of TB cases.

To assist with diagnosis of latent TB and screening of vulnerable groups, a new blood test, Interferon-Gamma Release Assay (IGRA), was introduced for relevant patient groups. This has the benefit of a single patient visit and faster results compared with skin testing.

In terms of diagnostic testing, use of liquid cultures of sputum began in Forth Valley in November 2013. This can reduce the delays in obtaining results and drug sensitivities from weeks to days.

The Health Protection (TB) Nurse and Respiratory (TB) Nurses provide the key worker roles for patients with TB, providing both support with diagnosis and assessment for the provision of the Directly Observed Treatment Service (DOTS). Direct observation of patients taking their prescribed medication in relation to TB ensures compliance to complete the full course of treatment. This helps to prevent the spread of the TB to others and decreases the chances of treatment failure or relapse.

A study is underway to investigate the prevalence of TB in Scottish Prisons. There has been an increase in TB in English prisons with associated policy to mitigate this. The current study will help inform Scottish Government policy for future action.

Screening of high risk ‘New Entrants’ to Forth Valley for TB is being developed.
Using a preventative approach, faster testing and improved compliance with treatment is likely to reduce the potential for spread within the community.

Immunisations

Childhood Immunisation Programme
NHS Forth Valley meets and regularly exceeds the recommended target of 95% uptake for Primary Immunisations.

The following significant changes to the Scottish Immunisation programme have been successfully implemented since 2013:

- the introduction of Rotavirus into the childhood immunisation programme for infants aged two and three months
- the removal of the second dose of Meningococcal C given at four months and the addition of a dose at the S3 booster appointment
- the introduction of a shingles vaccine for people aged 70 years (routine cohort) with a phased catch up programme over a number of years to protect against herpes zoster
- the phased introduction of an extension to the seasonal flu programme using the intranasal flu vaccine and targeting children from 2 years to primary school age. This programme may be extended to secondary school aged children in the coming years.

The extension of the seasonal flu programme for primary school aged children was initially introduced in a pilot programme (2013-14) and delivered by weekend flu sessions. This pilot focused on a limited number (25%) of Forth Valley primary school aged children, with good uptake of around 62%. Besides the direct benefit of protection afforded by the vaccine, the weekend approach also yielded indirect benefits which included wider engagement of the family and minimal disruption to the child’s education and the school nursing service. Unfortunately when rolled out to the full programme in 2014-15, this model of weekend delivery emphasised the dependence on parents to bring the child for vaccination and uptake remained static at around 63%.

Based on experience nationally, and the success of other Health Boards, NHS Forth Valley has adopted the weekday model of delivery for the 2015-16 programme. Furthermore the success of Immunisation Teams in delivering this programme in other Health Boards has also been recognised. A business case for an Immunisation Team was presented to the Health Board and support was given to establish an Immunisation Team within the Public Health directorate.

As well as delivering core immunisation programmes the team represents a significant enhancement to our ability to mobilise nursing resources to health protection incidents and challenges.

From 2015-16, the Immunisation team will deliver the seasonal flu programme in Primary Schools, and also provide support, resilience and flexibility to all current and developing vaccination programmes and the implementation of future national immunisation programmes.
Immunisation uptake statistics for all Boards and CHPs can be found on the ISD website.35

Seasonal Influenza Vaccination Programme (adult)
NHS Forth Valley has had the highest uptake for the over 65 year olds for the last seven years, and is regularly in the top three Health Boards for the under 65 cohort groups. 2014-15 figures show:

- FV Current uptake >65yrs 79.2% (Scottish average 76.3%)
- FV Current uptake <65yrs 56.5% (Scottish average 54%)
- FV Staff uptake 39.6% (Scottish Average 34.7%)

Human Papilloma Virus Vaccine
The Human Papilloma Virus (HPV) vaccination programme in Scotland started in 2008. The programme helps protect girls against cervical cancer later in life by routinely immunising them in early secondary school, at around 11-13 years of age through a school based vaccination programme. The vaccine protects against the two high risk HPV; types HPV-16 and HPV-18, known to cause over 70% of cases of cervical cancer. In 2014-15 over 94% of S2 girls in Forth Valley received the first dose of the HPV vaccine; this was the highest uptake amongst the Health Boards in Scotland, with the Scottish average at 91.4%. The HPV vaccine does not protect against all cervical cancers, so regular cervical screening is still important.

In September 2014, the schedule changed from three to two doses following revised guidance from the Joint Committee of Vaccination and Immunisation (JCVI).

New Immunisation programmes

Meningitis B Vaccine
The immunisation programme against Meningitis B (Men B) was included as part of the routine childhood vaccination programme, from 1st September 2015, with an appropriate catch up programme for babies at the start of the implementation period. A total of three doses are given at two, four and 12 months of age.

Meningitis ACWY Vaccine
In February 2015 the JCVI recommended the introduction of a meningococcal ACWY vaccination programme for young people to protect against Meningitis W (Men W), following an annual increase in cases since 2009. In Scotland there were 5 cases in 2014 compared to 6 cases in the first half of 2015 of which there was one death. The immunisation programme commenced in summer 2015. The programme had 2 components:

- The Primary Care based S5 and S6 School leavers and Freshers’ Programme which commenced in August 2015
- The school based catch up programme for 14-18 year olds which began in December 2015

In addition, the Men ACWY vaccine will be added to the routine adolescent schools programme from spring 2016 as a direct replacement for the Men C vaccine.

35 ISD: Child Health Publication
Emergency Planning and Civil Contingencies
Since the last annual report there have been structural changes impacting on national planning for emergencies.

The formation of a single national police service (Police Scotland) and a single Scottish Fire and Rescue Service provides an opportunity to consider the most effective multi-agency emergency planning and response coordination arrangements. The eight existing Strategic Coordination Groups (SCGs), based on the former policing areas structure moved to three Regional Resilience Partnerships (RRPs) in November 2013. At a strategic level, NHS Forth Valley became part of the East of Scotland Resilience Partnership incorporating the former Fife, Lothian & Borders and Central Scotland SCGs. The local working arrangements at tactical level are referred to as Local Resilience Partnerships (LRP) and include Central LRP, Fife LRP and Lothian & Borders LRP.

Emergency planning has been involved in a number of exercises with partner agencies, testing the NHS response to potential major incidents both internally and externally with partner organisations.

There has been considerable Public Health involvement in civil contingency planning. Partnership working is essential to safely deliver large public events, each of which results in a large influx of visitors and consequently a temporary increase in local population. Stirling hosted the 6th Annual Armed Forces Day National event and the Bannockburn 700 year anniversary on the same weekend in June 2014. Glasgow hosted the Commonwealth Games from 23 July to 3 August 2014 leaving a legacy which we hope will lead to improved lifestyles with a positive impact on health and wellbeing. Thereafter in September the Ryder Cup was held at nearby Gleneagles with transport links from Stirling.

Recent global concerns, relating to the increase in terrorist driven incidents has resulted in a UK Government response (Prevent) to encourage public sector staff to be aware of their role in the culture of vigilance around terrorism and in particular to prevent vulnerable individuals from radicalisation, especially on-line.

Prevent Strategy
UK Government’s overarching counter terrorism strategy is CONTEST36, with Prevent being one of four underlying strands. Prevent aims to stop people becoming radicalised or supporting terrorism. The health service is a key partner and plays a significant role in the delivery of Prevent as healthcare staff can recognise and support individuals, both patients and staff, who may be vulnerable and susceptible to radicalisation by extremists or terrorists. The NHS Forth Valley Prevent Implementation Policy describes the escalation process for raising Prevent-related concerns and provides practical guidance, to help reduce the risk of an individual becoming drawn into terrorism. An awareness-raising programme will be put into place to promote the understanding of radicalisation issues, confidence in dealing with Prevent-related concerns, and a culture of vigilance. This programme was rolled out from autumn 2015.

36 Playing our Part- Prevent Guidance for Health Boards- Jan 2015
Blood borne viruses (BBV) and Sexual Health
In 2011 the Scottish Government published The Sexual Health and BBV framework 2011-15 setting out the Scottish Government’s agenda in relation to sexual health, HIV, hepatitis C and hepatitis B. The existing structures have been combined into the Forth Valley Sexual Health and BBV Managed Care Network (MCN) which will deliver the main outcomes.

Forth Valley has experienced significant developments in recent years for sexual health services. The Forth Valley Sexual Health Action Plan describes recent changes, successes and improvements with BBV and sexual health teams working closely. This work benefits from being part of the West of Scotland Sexual Health Managed Clinical Network (MCN), established in 2010.

The Forth Valley Sexual Health Action Plan sets out to:
• Improve the sexual health and well-being of Forth Valley population, ensuring that inequalities in sexual health are addressed

The Action Plan identified the following key areas for development over the period of 2011-2013 in Forth Valley:
• men who have sex with men
• unwanted pregnancies
• condoms
• HIV
• increase knowledge of HIV and STIs amongst vulnerable populations
• partnership working

The key areas for development have all been incorporated into the work programme.

Public Health has recently completed a Sexual Health and Blood Borne Virus (BBV) Needs Assessment which will help inform strategic planning, commissioning and development of high quality sexual health services within NHS Forth Valley.

37 The Sexual Health and BBV framework 2011-15
38 Forth Valley Sexual Health and Blood Borne Virus (BBV) Needs Assessment
Screening

Adult screening

Cancer screening: see Table 2

Cervical screening
NHS Forth Valley has developed a best practice guidance paper: “Opting out women from the Scottish Cervical Screening Programme” recognising the need for a consistent and transparent approach to women who opt out of the Scottish Cervical Programme to ensure women are fully informed and all those eligible are maintained on registers. This approach has been adopted by the National Cervical Screening Programme.

Abdominal Aortic Aneurysm screening
The abdominal aortic aneurysm screening programme (AAA) was rolled out across Scotland, with implementation starting in Forth Valley in October 2013. This involves an ultrasound scan of the abdomen for all men when they reach the age of 65 years. NHS Forth Valley manages local scanning and management of results across three sites: FVRH, Stirling Community Hospital and Clackmannanshire Community Healthcare Centre. Uptake has been good – 87% (93% in least deprived quintile), with at least 1,500 scans anticipated per year. Across Scotland there have been fewer referrals requiring surgery than initially expected. The reasons for this are being explored at a national level.

Further information available at: NHS Inform; AAA screening

Diabetic Retinopathy screening
The Scottish Diabetic Retinopathy Screening Collaborative delivers a targeted screening programme for diabetic retinopathy screening. Retinopathy is a condition that is particularly prevalent in people with diabetes and can cause serious damage to the eyes and may result in blindness. If detected early and treated appropriately, damage can be minimised. Screening is offered annually to all patients over 12 years who have diabetes.

Pregnancy and Newborn screening
The public health service continues to support pregnancy and newborn screening programmes. Several different screening tests are undertaken throughout pregnancy and the newborn period. These include blood tests for a variety of inherited blood disorders and high risk infections such as Hepatitis B, ultrasound scans performed at different stages of pregnancy to screen for foetal anomalies, routine examination of the newborn, the newborn bloodspot test and newborn hearing screening.
<table>
<thead>
<tr>
<th>Scottish Cancer Screening Programmes</th>
<th>Eligibility</th>
<th>Test</th>
<th>Uptake in Forth Valley % (Scottish uptake %)</th>
<th>Programme Developments</th>
<th>Impact</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Breast</strong></td>
<td>Women aged 50-70</td>
<td>Mammogram approximately every 3 years</td>
<td>2011-2014; 72.1 (72.9) Over 3 yr rolling period&lt;sup&gt;39&lt;/sup&gt;</td>
<td>Recent formal review of breast screening service to ensure it remained effective and sustainable &lt;br&gt; Ongoing transformation from analogue equipment to digital mammography</td>
<td>In 2013-14, over 1,450 cases of screen detected breast cancer were diagnosed in women of all ages. &lt;br&gt; For every 400 women screened regularly for 10 years, one less women will die from breast cancer. This means around 130 women are prevented from dying from breast cancer each year in Scotland. Breast screening is an area that has been recently considered by a group of experts and they estimate that for every 1 woman who has her life saved from breast cancer through breast screening, 3 women will be diagnosed with breast cancer that might never have become life threatening.</td>
</tr>
<tr>
<td><strong>Cervical</strong></td>
<td>Women aged 20-60</td>
<td>Cervical smear every 3 years</td>
<td>2013-2014; 72.7 (70.7) Eligible group with smear in previous 3.5 years&lt;sup&gt;41&lt;/sup&gt;</td>
<td>From April 2016: &lt;br&gt; • age range will change to 25-64yrs &lt;br&gt; • frequency of cervical screening will continue to be every 3 years from age 25 to age 50, but will change to be every 5 years for women from age 50 to 64 plus 364 days of age. &lt;br&gt; • Women on non-routine screening (where screening results have shown changes that require further investigation/follow up) will be invited up to age 70 years plus 364 days of age (a change from current arrangements up to age 68).</td>
<td>Around 5,000 lives saved in the UK every year &lt;br&gt; 8 out of 10 cervical cancers prevented from developing.</td>
</tr>
<tr>
<td><strong>Bowel</strong></td>
<td>All men and women aged 50–74</td>
<td>Home testing kit for stool every 2 years</td>
<td>2014 Males; 53.8(53.3) Females; 58.6(58.8) Overall;56.3(56.1)&lt;sup&gt;44&lt;/sup&gt;</td>
<td>Bowel scope screening being offered to some men and women during pilot phase</td>
<td>Home testing prevents 150 deaths from bowel cancer every year.</td>
</tr>
</tbody>
</table>

Table 2: Adult Cancer Screening programmes

<sup>39</sup> ISD Scotland, [Scottish Breast Screening Programme](#)
<sup>40</sup> NHS Health Scotland: Breast Cancer, [Helping you decide](#)
<sup>41</sup> ISD Scotland, [Cervical screening](#)
<sup>42</sup> National Services Division, [NSD Cervical Screening](#)
<sup>43</sup> NHS Health Scotland Cervical Screening Leaflet, [Put it on your list](#)
<sup>44</sup> ISD, [Scottish Bowel Screening Programme](#)
<sup>45</sup> NHS Health Scotland, [Bowel Screening](#); The bowel screening test, your questions answered.
Summary

This report provides access to useful information on the health and wellbeing of the local population in Forth Valley as well as presenting an overview of the work within Public Health. Our key priorities are supporting children in the early years, promoting access to ‘worthwhile work’ and delivering substance misuse services with a recovery orientated focus. We also acknowledge the need to ensure our services address the needs of an ageing population.

I hope that as well as providing a source of Forth Valley specific publications this report will be used as a gateway to Public Health issues and resources, particularly those found on-line.
Acknowledgments

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