SLOUGH BOROUGH COUNCIL

REPORT TO: Education and Children's Services Scrutiny Panel

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WARD(S): All wards in Slough

FOR COMMENT & CONSIDERATION

Childhood immunisations - update

1 Purpose of Report

This report is to provide an update on childhood immunisation coverage in Slough and the action that is being taken to improve coverage. The report will:

- Provide an update on childhood immunisation coverage in children under 5 years
- Outline the challenges and issues related to low uptake
- Highlights the actions underway to improve uptake
- Consider how GP practices, Clinical Commissioning Groups, Public Health and Local Authorities can work with Public Health England and NHS England Thames Valley Area Team to improve immunisation uptake in Slough

2 Recommendation(s)/Proposed Action

The group is advised to:

- To make a note of the past and current performance in childhood immunisations
- To be aware of the changes in national immunisation schedule and the changes in the roles and responsibilities with regards to commissioning and monitoring from 1st April 2013.
- To explore opportunities for local support to develop the action plan with partners and to get resources to develop and implement the action plan to improve the uptake and reduce the inequalities.

3 The Slough Wellbeing Strategy, the JSNA and the Corporate Plan

The issues of childhood immunisations identified in the JSNA 2013 must inform the Health and Wellbeing strategies as stated in the guidance on building Joint Health and Wellbeing strategies (DH 2011).

Slough Wellbeing Strategy Priorities

The Healthy Lives Healthy People specifically mentions the uptake of childhood immunisation as a priority.

Corporate Plan

There are five themes within the corporate plan including a theme on new ways of working which this report supports

Other Implications

(a) Financial

- The costs of the Thames Valley Primary Care Child Health System are funded by the area team of NHS England
- The costs of PH staff time to monitor and support local practices and undertake outreach via health activists is covered within existing PH grant resources.
- The costs of SMS texting software are covered by the clinical commissioning group
- The pilot is being funded by NHS England.

(b) Risk Management

Risk	Mitigating action	Opportunities
That a multiagency approach is required	A joint action plan has been agreed with Thames Valley Primary Care Agency	A working group has been established which links TVPCA/PH/NHS England, GPS and the CSU
That the JSNA does not reflect the latest immunisation data	The data will be uploaded quarterly	PH information team to work with local PH team
Staff capacity to run the extracts for catch up programmes is limited in local practices	Fund CHART queries and automated feeds	Drop in clinics are offered and will be further promoted

4 Supporting Information

4.1 Background

Vaccination / Immunisation is one of the most powerful and cost-effective of all health interventions. Plotkin et al in his book “Vaccines” states that “With the exception of safe water, no other modality, not even antibiotics, has had such a major effect on mortality reduction…”

Children in England are protected through immunisation against many serious infectious diseases. Vaccination programmes aim both to protect the individual and to prevent the spread of these illnesses within the population. As a public health measure, immunisations have been hugely effective in reducing the burden of disease. It is of public health concern when immunisation rates fall, as this increases the possibility of disease transmission, and hence complications arising from outbreaks of infectious diseases.

The UK Childhood Immunisation Schedule covers the recommended immunisations for children and young people (aged 0 to 18 years). The schedule (appendix 1) comprises the recommended universal or routine immunisations which are offered to all children and young people, as well as selective immunisations which are targeted to children at higher risk from certain diseases. The target of the national immunisation programme is for 95% of children to complete courses of the routine childhood immunisations at appropriate ages.

4.2 Changes in Childhood Immunisation Schedule for 2013/14

A number of changes to the national immunisation programme are being made during 2013-14 to reflect the planned and phased implementation of a series of recommendations by the Joint Committee on Vaccination and Immunisation (JCVI) to improve the overall level of protection against preventable diseases. They are:

- **Meningitis C**: From June 2013, changes to the current schedule for administering the MenC vaccine. The second priming dose currently given at four months will be replaced by a booster dose given in adolescence. The change has occurred with the four month dose ceasing in June 2013.

- **Rotavirus**: From July 2013, the introduction into the childhood immunisation schedule of a vaccine to protect babies against rotavirus.

- **Shingles**: From September 2013, the introduction of a shingles vaccine for people aged 70 years (routine cohort) and 79 years (catch-up cohort) to protect against herpes zoster.

- **Childhood Flu**: The existing flu immunisation programme will be extended over a number of years to include all children aged two to 16 inclusive. In autumn 2013, immunisation will be offered to a limited age range of pre-school-aged children.

From April 2013 the commissioning and monitoring arrangements for the Screening and Immunisation service have changed, these changes include:

- NHS England Thames Valley Area team is responsible for commissioning the immunisation programme in England.
- Public Health England along with NHS England Thames Valley Area team is responsible for surveillance and monitoring of the immunisation programme in England.
- GP Practices are the main providers of childhood immunisation for children under 5 years old commissioned by NHS England and with a quality duty in CCGs.
- Currently, School Nurses in BHFT are the primary provider for school based immunisations in Berkshire. School Nursing Service is commissioned by Local Authority Public Health, but the school based immunisation service is commissioned by NHS Thames valley Area Team.
- Public Health England covers the previous HPA functions related to childhood immunisation, health protection reactive work, outbreak management etc.

4.3 Childhood Immunisation Statistics (COVER stats)

The COVER (Cover of Vaccination Evaluated Rapidly) programme evaluates childhood immunisation in England. Public Health England (PHE) in collaboration with other agencies collates UK immunisation coverage data from child health systems for children aged one, two and five years of age. The COVER programme monitors immunisation coverage data for children in the United Kingdom who reach their first, second or fifth birthday during each evaluation quarter. This information is promptly fed back to local level, creating the opportunity to improve coverage and to detect changes in vaccine coverage quickly.

Current Performance

The quarterly immunisation coverage in Slough for Q1 (Apr-Jun 2013) and Q2 (Jul-Sept 2013) is shown in the table 1 and table 2 below compared to other East local authorities and to national averages.

Table 1: Childhood Immunisation uptake by Local Authority in Slough compared to other UAs and England, Q1 (Apr – June 2013).
Source: NHS Thames Valley

Area	1 year		2 years				5 years		
	Total	All 3 doses DTaP/IPV/Hib (%)	Total	PCV booster (%)	HibMen C booster (%)	MMR1 (%)	Total	MMR2 (%)	Pre-school booster (%)
Slough	**580**	**94.5%**	**565**	**91.9%**	**91.9%**	**91.9%**	**559**	**80.3%**	**80.7%**
Bracknell-Forest	332	96.4%	367	92.1%	92.4%	91.6%	376	86.7%	88.0%
Royal Borough	487	96.7%	447	91.9%	92.2%	91.5%	523	88.5%	90.1%
Berkshire East	1399	94.3%	1379	89.8%	89.8%	89.7%	1458	81.1%	81.3%
Berkshire West		94.8%		92.6%	93.6%	94.5%		91.1%	91.7%
England		94.7%		92.8%	92.9%	92.6%		89.3%	90.2%

Key:	≤85%	85% - 94.9%	≥95%	Source: COVER stats, PHE, 2013.

- Children aged 1 year: 580 children reached one year of age this quarter. Only 548 (94.5%) children were fully immunised with all 3 doses DTaP/IPV/Hib and the remaining 32 children were either unimmunised or partially immunised at the end of this quarter.
- Children aged 2 years: 565 children reached two years of age this quarter. Only 519 (91.9%) children were fully immunised with PCV / Hib Men C boosters and MMR 1. The remaining 46 children were not immunised get these jabs at the end of this quarter.
- Children aged 5 years: 559 children reached five years of age this quarter. Among them, 449 (80.3%) had their MMR 2nd dose and 451 (80.7%) had their pre-school booster jab. 110 children did not have their MMR 2nd dose and 108 children missed their pre-school booster at the end of this quarter.
- Most GP surgeries performed well among children aged 1 and 2 years.
- Poor performance (<85%) was seen in 6 GP practices among children aged 5 years. One practice with relatively high number of children, had poor uptake (<85%) for both MMR 1st and 2nd dose.
- As some numbers are relatively small, these performance figures should be interpreted with caution and needs to be compared with the past performance and followed up in future.

Table 2: Childhood Immunisation uptake in Slough compared to other UAs in East Berkshire and England, Q2 (July – Sep 2013).
Source: NHS Thames Valley

Area	1 year		2 years				5 years		
	Total	All 3 doses DTaP/IPV/Hib (%)	Total	PCV booster (%)	HibMen C booster (%)	MMR1 (%)	Total	MMR2 (%)	Pre-school booster (%)
Slough	**671**	**94.04%**	**677**	**88.04%**	**87.00%**	**88.33%**	**652**	**75.61%**	**75.31%**
Bracknell-Forest	426	92.96%	483	90.48%	90.48%	89.86%	508	80.91%	82.28%
Royal Borough	440	93.41%	456	91.45%	92.11%	92.11%	460	86.52%	87.17%
Berkshire East	866	93.19%	939	90.95%	91.27%	90.95%	968	83.57%	84.61%
Berkshire West		93.71%		92.93%	93.32%	94.91%		89.68%	90.92%
England		94.34%		92.67%	92.72%	92.68%		88.47%	89.02%

The uptake figures dropped in Q2 in Slough especially among children aged 2 and 5 years of age. Some of the reasons contributing to drop in performance figures are:

Changes to the Child Health Information System

- The child health information system used in Berkshire East changed in March 2011 from McKesson to Rio. This involved cleansing data and migrating data between the systems. There are differences in data coding and storage, which we believe has had a negative impact on coverage data for Q2.
- In March 2013, the Child Health Information Team previously employed by Berkshire East PCT moved to Reading and merged with the team from Berkshire West. This move resulted in high staff turnover and change in processes, which could have had some impact on data processing and quality.

GP Practices call / recall system

- There is no agreed call recall system in GP practices to identify the children when they are due, invite them for immunisation, re-invite them if they default and have alternative ways to deal with repeat defaulters.

4.4 Actions already being taken to improve performance in the MMR catch up programme:

<u>MMR catch-up project (measles, mumps and rubella) in Slough</u>
The Department of Health, Public Health England and NHS England jointly launched a campaign aiming to drive up demand for MMR vaccination. This was in response to an increase in the number of measles cases in England over the last two years with an annual total of 1,920 confirmed cases in 2012, the highest annual figure since 1994.

There is a high rate of measles cases among teenagers, which has not been experienced in previous years. The 10 to 16 year old age group are mostly affected by the adverse publicity relating to MMR vaccine between 1998 and 2003 and therefore there are larger numbers of children of this age unimmunised or partially immunised against measles. This creates the potential for school based outbreaks as seen in Swansea and the north east of England.

Although there has not been an increase in confirmed cases in Slough, there is still the potential for outbreaks particularly in those areas where coverage of MMR immunisation has been low in the past. One dose on MMR vaccine is 90-95% effective at protecting against measles infection. Two doses will protect 99% of those immunised. There is a national target to immunise 95% of children with one dose of vaccine by the age of 2 years and 2 doses of vaccine by the age of 5 years.

Nationally it is estimated that as a result of the campaign the number of 10-16 year olds immunised against measles has increased by 1%. This data is not available at local level. It has been recognised nationally that obtaining accurate information on the coverage of MMR immunisation in 10-16 year olds is very difficult.

Action to deal with issues related to data quality

MMR vaccination – audit findings
In order to investigate the level of and potential reasons for under-recording, an audit of a small number of practices was undertaken with the aim of evaluating the records of 80 children (aged 10-16yrs) who are coded as unvaccinated at 4 GP practices (2 in Reading and 2 in Slough) with low MMR uptake.

For the two Slough practices, 55% and 75% of 10-16 year olds audited, actually had a record of MMR vaccination in their electronic notes. The proportion of parents / guardians who had been sent a previous MMR letter was 67% in one practice and over 93% in the other. The main reason for the discrepancy in both Slough practices was a software issue. The clinical audit system (software) cannot currently capture electronic coding of MMR accurately from electronic clinical records. Work is in progress to upgrade the system within the next few months.

- Enhanced Phase 2 MMR catch up: A project to improve uptake in lowest performing practices has recently been signed off. The project will provide clinical resources to a number of practices so that they can review all children (10-16 year olds) with zero or one dose of MMR to explore the reason(s) and to take action to get them immunised. The NHS England Area Team has provided funding for this project and it will be delivered by the LA Public Health Team and CCG. The project is expected to report on its work and outcomes in March 2014.

4.5 Proposed actions for Q3 and onwards to increase routine coverage

There are a number of options to improve this situation working with the Area Team:

- Continue to deliver on the existing work plan including:

Improve data quality

a) Updating Software in all GP practices and in Child Health Information System
b) Standardising Read codes in all GP practices
c) Implementing electronic data flow system in Berkshire East
d) Implementing electronic upload from GP practices on to Rio i.e. Child Health Information System
e) Data cleaning in both GP Practices and Rio i.e. Child Health Information System including removing all ghost patients.
f) Promoting practices conduct monthly electronic upload of childhood immunisation activity to CHART data warehouse to expedite updating on to Rio
g) Encouraging practices to schedule their own primary immunisations to maximise resources and ensure timely vaccination

Improving the primary care immunisation services

a) Standardising the call / recall to invite children for jabs across all GP practices.
b) Improving access to jab services e.g. walk-in-immunisation clinics, evening / Saturday clinics, more clinics during school holidays etc.
c) Commissioning alternative providers to offer immunisation services e.g. pharmacies, health visitors etc.
d) Opportunistic offer of childhood immunisations at all settings e.g. GP surgeries, hospital appointments etc.

A project is underway to work with GP practices to roll out the electronic upload of immunisation data which has shown promising results in other areas to help improve coverage. The idea is to encourage practices to undertake scheduling of primary immunisations to ensure efficiency in immunisation clinics and smooth flow of data.

General awareness raising through health promotions/campaigns in the community to increase awareness and improve uptake.

a) Promotion has occurred through use of health activists within the Gurdwara, Mosques, early years teams and schools. This work is on going.
b) A pilot campaign is underway to change the way in which invitations are sent for the MMR catch up – via SMS text – this will commence in February. It is being led by the GP lead for the CCG and will be

linked to software upgrades for all practices with the aim to improve uptake of all childhood immunisations in future.

c) General Campaigns through various settings e.g. children's centres, nurseries, play groups/ other settings
d) Targeted campaigns to hard-to-reach and vulnerable groups including travellers.
e) Targeted campaigns at the time of school applications / admissions, council applications for benefits etc.

5 Comments of Other Committees / Priority Delivery Groups (PDGs)

This information will be presented to the Wellbeing Board on 29 January 2014, and then to each of the partnership boards to ensure that the gaps identified are costed and a plan will be brought back to the Wellbeing board for endorsement. The findings will also be discussed with the community during the consultation phase and a final version discussed with the Health Scrutiny Panel.

6 Conclusion

- Immunisation uptake is reasonably good among one and two year old children, but needs to improve to achieve the required 95% target.
- Wide variations in the childhood vaccination uptake within Slough
- Poor uptake among children at 5 years especially 2nd dose of MMR.
- There were number of changes this year both in immunisation schedule and in the roles and responsibilities in regards to commissioning and monitoring from 1 April 2013.
- LA public health needs to closely work with NHS Thames valley, CCG, PHE to develop an action plan to improve the uptake this year and reduce the variations.

7 Appendices attached

A - National benchmarked outcomes

8 Background Papers

1. Slough JSNA 2013 available at www.slough.gov.uk/council-strategies-plans-and-policies/joint-strategic-needs-assessment-jnsa.aspx

2. Public Health outcomes framework available at http://www.phoutcomes.info/

3. NHS outcomes framework available at http://www.ccgtools.england.nhs.uk/ccgoutcomes/flash/atlas.html

4. Adult Social Care Outcomes framework available at http://ascof.hscic.gov.uk/Outcome/617/

5. Childrens Outcomes Framework available at http://fingertips.phe.org.uk/profile/cyphof/data#gid/8000025/pat/43/ati/102/page/0/par/X25004AF/are/E06000036

6. Buck and Gregory (2013). *Improving the publics health*. Kings Fund available at http://www.kingsfund.org.uk/publications/improving-publics-health

7. Health Protection Priorities in the Thames Valley 2013-14. PHE England available at http://www.google.co.uk/url?sa=t&rct=j&q=&esrc=s&frm=1&source=web&cd=1&ved=0CDIQFjAA&url=http%3A%2F%2Fwww.hpa.org.uk%2Fwebc%2FHPAwebFile%2FHPAweb_C%2F1317135862125&ei=3uPTUpLIK5GVhQf_x4HwBQ&usg=AFQjCNErayXEi-tQcnlxJpkPu3kUsnZOAw&sig2=mTXTiTemqgWlBhaTzbQCig

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Appendix A

National benchmarked outcomes

1A PUBLIC HEALTH OUTCOME DATA – JANUARY 2014.

DOMAIN 1 – WIDER DETERMINANTS (YEAR REPORTED)

Statistically better than average

- Pupil absence (2011/12)
- Those not in education, employment or training - NEET (2012)
- Killed and seriously injured on England's roads (2010-12)
- The numbers of complaints about noise (2011-12)
- Statutory homelessness (2011-12)
- Fuel poverty (2011).

Statistically worse than average

- Children living in poverty (under 16s) (2011),
- Violent crime (including sexual exploitation)(2012/13)
- Utilisation of outdoor space for exercise and health reasons (2012-13)
- Percentage of adult social care users who have as much contact as they would like (2011/12)
- Re-offending levels (NB data are from 2010).

DOMAIN 2 – HEALTH IMPROVEMENT

Statistically lower than average

- Smoking status at time of delivery (2011/12)
- Under 18 conceptions (2011)
- Percentage of active adults
- Access to diabetic retinopathy screening programme
- Take up of NHS Healthcheck among those eligible
- Self reported wellbeing - people with a low happiness score

Statistically higher than average

- Low birth weight of term babies (2011)
- Excess weight in 10-11 year olds (2011/12)
- Percentage of physically inactive adults (2012)
- Smoking prevalence (adults)
- Recorded diabetes (2011/12)
- Breast and cervical cancer screening coverage (2013)
- Access to diabetic retinopathy screening (2011/12)
- Health checks offered (2012-13)
- Injuries due to falls in people aged 65+ (2011-12)
- Self reported wellbeing - people with a low satisfaction score and high anxiety score

DOMAIN 3 – HEALTH PROTECTION

Statistically higher than average.

- Fraction of mortality attributable to particulate air pollution
- TB treatment completion rates
- Slough's incidence of TB has risen to a rate of 56.7 per 100,000 compared to 15.1 in England (Public Health Outcomes Framework 2010-2012)

Statistically lower than average

- Chlamydia diagnoses (NB the JSNA notes that data from the laboratory was not uploaded fully in 2012 so this underreports the true value which was reported as).
- Population vaccination coverage for flu (at risk individuals), for MMR one dose (5 year olds) and for HPV.

DOMAIN 4 – HEALTHCARE AND PREMATURE MORTALITY

Statistically lower than average - none

Statistically higher than average –

- tooth decay in under 5's
- Under 75 mortality rate from all cardiovascular diseases and those considered preventable (2009-11)
- mortality from communicable diseases (2009-11)
- emergency readmissions within 30 days of discharge from hospital
- preventable sight loss age related macular degeneration and preventable sight loss from diabetic eye disease (2011-12)
- hip fractures in people aged 65 and over aged 65-79 (2011/12)
- excess winter deaths (single year 2010 -11 aged 85+)

1B. NHS DOMAIN DATA

DOMAIN 1 – PREVENTING PEOPLE FROM DYING EARLY

Statistically higher than peer and England average

- cardiovascular disease mortality under 75 (2012)
- years of life lost through conditions amenable to healthcare (2012)

DOMAIN 2 – ENHANCING QUALITY OF LIFE FOR PEOPLE WITH LONG TERM CONDITIONS – SEE OVERLAP WITH ASCOF

None were statistically higher or lower than peer and England average

DOMAIN 3 – HELPING PEOPLE TO RECOVER FROM EPISODES OF ILL HEALTH AND INJURY

Statistically higher than peer and England average

- Emergency admissions after 30 days

None were statistically lower than peer and England average

DOMAIN 4 – ENSURING THAT PEOPLE HAVE A POSITIVE EXPERIENCE OF CARE
None were statistically higher or lower than peer and England average

DOMAIN 5 – TREATING AND CARING FOR PEOPLE IN A SAFE ENVIRONMENT AND PROTECTING THEM FROM AVOIDABLE HARM
Statistically lower than average

- Healthcare acquired infections MRSA

1C. ADULT SOCIAL CARE DOMAIN DATA (2012-13)

NB outcomes where the numbers reported are low and therefore the confidence intervals are wide are not reported here.

Slough's ASC results that were higher than comparators for

- People receiving self directed support
- Adults in contact with mental health services in employment
- Adults with learning disability in stable accommodation
- Adults with mental health conditions in stable accommodation
- People who use services and carers who find it easy to find information

Slough's ASC results that were lower than comparators were

- People receiving direct payments
- Service users with control over their daily life
- Adults with a learning disability in employment
- Permanent admissions to care homes
- People offered reablement following discharge from hospital
- Delayed transfers of care (NB Slough ASC performs better than average for DTOC attributable to social care)
- Client satisfaction with care and support

1D. CHILDRENS OUTCOMES FRAMEWORK (January 2014)

Many of the indicators shown that are above the England average are also reported in the main PH Outcomes framework age i.e child poverty, excess weight for 10-11 year olds, population coverage of PCV vaccinations, for MMR1 and 2 doses at age 5, for HPV coverage and tooth decay. A single additional indicator is shown for 'hospital admissions for unintentional injuries in young people' and the Chlamydia screening data is even older than in the PHOF report. This information will be revised within a few months. Until that happens the data should be viewed with caution.