JOINT SUB-COMMITTEE ON ADVERSE REACTIONS TO VACCINATION AND IMMUNISATION

Minutes of the meeting held on Monday 17 September 1990 at 1.30pm in Room 85 Hannibal House

Present: Professor A Breckenridge (Chairman)
Dr Bowie
Dr Cavanagh
Dr P Fine
Professor F Harris
Dr Kennedy
Professor McDevitt
Professor D Miller
Dr E Miller

DH: Dr D Salisbury (Assessor)
Mrs S Thomas (Temporary Secretary)
Dr J Hilton
Dr F Rotblat
Dr E Rubery
Dr P Waller
Mr P Whitbourn

1. Announcements and Confidentiality

The Chairman reminded members about the confidentiality of the proceedings of the meeting.

2. Welcome to New Members

Dr Colin Kennedy, Dr Patrick Waller and Dr Eileen Rubery were welcomed to this ARVI meeting.

3. Apologies for Absence

Apologies had been received from Dr Banatvala and Dr Wood.

4. Minutes of the Last Meeting

Members had only received the minutes at the meeting, so that they were not able to agree them. Members were asked to forward any comments back to Dr Salisbury.

Matters Arising

re were none from the minutes.

asked whether there had been any feedback on a paper he mitted to JCVI 18 months ago on 'Systems of Surveillance'. recalled the paper, but thought that it had just been ed. would investigate the matter and convey his ndings to

Adverse Reactions to MMR

here are currently three vaccines in use in the UK, anufactured by SmithKline Beecham and Merieux (using Urabe umps strain) and MSD, distributed by Wellcome (using Jeryl Lynn train). It was noted that there had been consistent reductions n the notifications of measles, mumps and rubella since the ntroduction of the MMR vaccine. This was welcomed.

6.1 Measles, Mumps and Rubella Notifications

Graph A - The notifications of measles have continued to decrease since the introduction of MMR vaccine. Despite anticipations, there had been no epidemic of measles this year and presently notifications were less than three hundred each week.

Graph B - Again, the mumps notifications were declining rapidly. Reporting to the RCGP Sentinel Surveillance Scheme also showed similar reductions. This was found to be a very encouraging sign.

6.2 Supply of MMR Vaccine

It was noted that still held the larger share of the market. The vaccine was found to have lost ground and have now taken over those lost sales from . There was no backlog in filling orders from health authorities. The type of vaccines supplied was decided upon by the ordering pharmacist within each Regional Health Authority. It was found that the distributors preferred the varieties for posting long distances, but for vaccine which was required more locally, the distributors used the vaccine. The time out of the fridge that manufacturers allowed for their vaccines was longer for the and products.

6.3 Review of Cases Reported on Yellow Cards

6.3.1.The following criteria had been applied to the assessments:
Definite=Virus isolated from CSF, time course of 14-28 days;
Possible/probable=Cells isolated from CSF, no virus in CSF,acceptable time course.
It was noted that there were 10 definite cases of meningitis/encephalitis. It was likely that local awareness had a bearing on the clustering of cases in the origin of some of the reports.

6.3.2. One case had been reported from Cambridge. The patient had received the strain of single antigen mumps vaccine. After five weeks the patient was reported to have developed mumps meningitis. No CSF was obtained in this case.

6.3.3. It was considered that the clustering of cases in Crawley was a result of increased local awareness. However, one of those cases had actually been vaccinated in Scotland and had been taken ill in Crawley. The clustering of cases in Kidderminster was also noted. These will be investigated further.

6.3.4. It was noted that the mumps viruses obtained from two out of the three cases from Nottingham were sequenced and shown to be vaccine related. The patients had all been vaccinated from different batches and did not live close to each other. These patients were not severe clinical cases.

6.3.5. One case of bilateral deafness had been reported, and coded as possible. This was an atypical presentation of mumps related deafness, and there was no evidence as to the presence of meningoecephalitis.

6.4 Report from BPSU Study on Neurological Reactions following MMR vaccine.

reported on the BPSU scheme for reporting reactions following MMR vaccine. Reporting started in February 1990. There had been 19 cases reported to date of meningoecephalitis associated with MMR vaccine.

It was found that two thirds of the cases reported to the BPSU had also been reported on yellow cards to the CSM. It was agreed that it was important that all of these cases were followed up.
informed the committee that a Research Fellow was currently in post and all of the reported cases to either CSM or BPSU, were now being investigated.

There are currently four avenues for adverse reaction reporting for ADRs following MMR vaccine; via the Yellow Cards,the BPSU scheme, directly to CDSC and through Laboratory reports. It was

recognised that the use of such data was limited for detailed epidemiological evaluation and in order to further validate vaccine related illnesses, fuller studies would be required.

6.5 Article "Characteristics of live mumps vaccine in current use" J Millstein

This article was noted. In conclusion it was pointed out that the Urabe strain was more reactogenic but also more immunogenic than the Jeryl Lynn strain. This was re-inforced by information from Sweden suggesting only 80% seroconversion using the MSD vaccine.

It was noted that the introduction of mumps immunisation could in theory shift the age specific infection rates to older age groups in whom the complications were greater; nevertheless, the gains from the progressive reductions in mumps illnesses outweighed such concerns. This observation was supported by Prof. Anderson's work on modelling of mumps infections and immunisation.

6.6 Draft article "Aseptic meningitis as a complication of mumps vaccine" A Sugiura et al

The chairman reminded members that this paper was confidential and not for publication.

This paper highlighted the increased numbers of isolations of mumps viruses from the CSF following the promotion of MMR vaccine in Japan. The paper confirmed information from Japan previously disclosed to ARVI. The Committee found it most reassuring that there had been no sequelae from these cases of meningitis.

6.7 Conclusions

Thus ARVI's conclusions on the present position concerning ADR's to MMR vaccine are as follows:

6.7.a The impact of the MMR programme has been most successful in achieving considerable reductions in the target diseases; mumps elimination is a realistic prospect in the near future.

6.7.b After intense demand for vaccine, and matching frequency of ADRs, (see last ARVI meeting), vaccine distribution is now less, despite three products being available. Each of these incorporates either different mumps viruses, or uses different culture techniques.

6.7.c There has been no increase in the rate of reports of either definite vaccine associated cases or probable/possible cases. Whilst the rate should remain constant, it is anticipated that the number will fall as vaccine use declines to a steady rate.

6.7.d It is likely that the SKB Urabe 9 vaccine is more reactogenic and more immunogenic than the MSD Jeryl Lynn strain. This is supported by anecdotal evidence from Sweden suggesting only 80% seroconversion using the MSD vaccine.

6.7.e The BPSU scheme is providing excellent surveillance to supplement reporting to CSM.

6.7.f This sentence was amended by the committee to read "There should be no change in the present recommendations or supply of MMR vaccine on the evidence available to us at the present time".

7. Review of adverse reactions following hepatitis B Vaccine

This paper was noted.

8. Review of adverse reactions following influenza vaccine

This paper was noted. It was also agreed that there should be no further addition of text to that which already appears in the memorandum "Immunisation against Infectious Diseases 1990".

9. Any other Business

None.

10. Date of Next Meeting

The next meeting would be in six months time. Members were advised that they would be contacted to agree a suitable date.