CENTERS FOR DISEASE CONTROL

May 10, 1985 / Vol. 34 / No. 18

MMWR

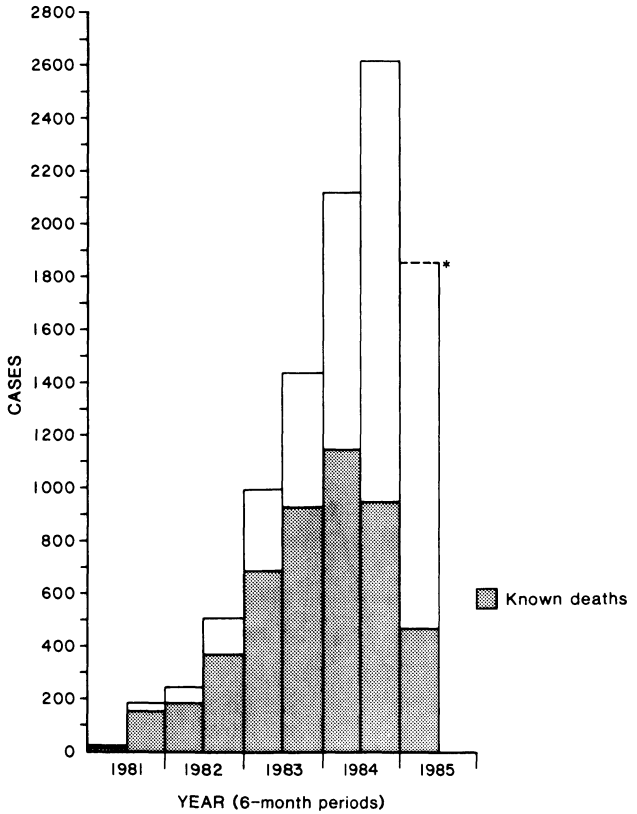
MORBIDITY AND MORTALITY WEEKLY REPORT

Current Trends

Update: Acquired Immunodeficiency Syndrome — United States

As of April 30, 1985, physicians and health departments in the United States had reported 10,000 patients (9,887 adults and 113 children) meeting the surveillance definition for acquired immunodeficiency syndrome (AIDS) (*1,2*). Since the initial reports of AIDS in the spring of 1981 (*3,4*), the number of cases reported each half-year has increased (Figure 1). Over half of the 10,000 cases have been reported within the last 12 months. Four thousand nine hun-

FIGURE 1. Acquired immunodeficiency syndrome cases and known deaths, by 6-month period of report — United States, 1981-April 1985



*Data incomplete

AIDS — Continued

dred forty-two of all reported patients are known to have died (49% of the adults and 69% of the children); 75% of patients diagnosed before January 1983 are known dead.

Adult patients. Among adult AIDS patients, there has been no significant change over time in distribution by age, race, and sex. Ninety percent of adult patients are 20-49 years old. Sixty percent are white; 25%, black; and 14%, Hispanic. Ninety-four percent are men.

Reported cases have increased substantially in all patient groups. However, some changes in the relative proportion of cases have been noted. Since 1981, the proportion of AIDS cases in transfusion recipients has increased significantly ($p < 0.01$), while the proportion of cases in "other/unknown" patients has decreased significantly ($p < 0.001$) (Table 1). The latter reflects a smaller rate of increase of AIDS among Haitian-born patients who are placed in the "other/unknown" category. Although there has been a slight increase in the proportion of patients who are homosexual/bisexual men, it is not statistically significant.

The proportion of adult patients with Kaposi's sarcoma (KS) alone and with both KS and *Pneumocystis carinii* pneumonia (PCP) has decreased significantly ($p < 0.001$) (Table 2). This is associated with a significant increase in the proportion of cases with PCP and no KS. The distribution of cases with other opportunistic diseases has remained relatively constant.

Adult AIDS patients have been reported from 46 states, the District of Columbia, and three U.S. territories. Among cases reported before May 1983, 47% of the adults were residents of New York. Between May 1984 and April 1985, the proportion of adults reported with AIDS from this state decreased significantly ($p < 0.001$) to 34% of the total.

Pediatric patients. Among AIDS patients under 13 years old, there has been no statistically significant change in distribution by age, race, sex, and disease presentation over time. Fifty-

TABLE 1. Acquired immunodeficiency syndrome (AIDS) patients, by patient group and date of report — United States, through April 1985

	Cases reported							
	Before May 1983		May 1983-April 1984		May 1984-April 1985			
Patient group	No.	(%)	No.	(%)	No.	(%)	Total	(%)
Adult								
Homosexual/bisexual	992	(71.5)	2,070	(72.5)	4,199	(74.4)	7,261	(73.4)
IV drug user	233	(16.8)	510	(17.9)	942	(16.7)	1,685	(17.0)
Hemophilia patient	11	(0.8)	17	(0.6)	37	(0.7)	65	(0.7)
Heterosexual contact	13	(0.9)	23	(0.8)	45	(0.8)	81	(0.8)
Transfusion recipient	12	(0.9)	34	(1.2)	88	(1.6)	134	(1.4)
Other/unknown	126	(9.1)	202	(7.1)	333	(5.9)	661	(6.7)
Total	**1,387**	**(100.0)**	**2,856**	**(100.0)**	**5,644**	**(100.0)**	**9,887**	**(100.0)**
Pediatric								
Parent with AIDS or at increased risk for AIDS	11	(57.9)	27	(67.5)	43	(79.6)	81	(71.7)
Hemophilia patient	2	(10.5)	1	(2.5)	3	(5.6)	6	(5.3)
Transfusion recipient	2	(10.5)	8	(20.0)	5	(9.3)	15	(13.3)
Other/unknown	4	(21.1)	4	(10.0)	3	(5.6)	11	(9.7)
Total	**19**	**(100.0)**	**40**	**(100.0)**	**54**	**(100.0)**	**113**	**(100.0)**
TOTAL	**1,406**	**(100.0)**	**2,896**	**(100.0)**	**5,698**	**(100.0)**	**10,000**	**(100.0)**

AIDS – Continued

eight percent of the pediatric patients were under 1 year old at diagnosis. Fifty-five percent are black; 22%, white; and 21%, Hispanic. Sixty-three percent are male. Sixty-eight percent had PCP without KS; 2% had KS and PCP; 4% had KS without PCP; and 26% had other opportunistic diseases. Eighty-one (72%) of the 113 pediatric patients came from families in which one or both parents had AIDS or were at increased risk for developing AIDS; 15 (13%) had received transfusions of blood or blood components before their onsets of illness, and six (5%) had hemophilia. Risk factor information on the parents of the 11 (10%) remaining patients is incomplete. Pediatric cases have been reported from 17 states; cases reported per state ranged from one to 53 (median one). Eighty-two percent of the pediatric cases have been reported from New York, New Jersey, Florida, and California. Of the 81 pediatric patients with a parent with AIDS or at increased risk for AIDS, 69 (85%) were residents of New York, New Jersey, or Florida—states in which over 84% of the heterosexual adult cases were reported.

Reported by State and Territorial Epidemiologists; AIDS Br, Div of Viral Diseases, Center for Infectious Diseases, CDC.

Editorial Note: The number of AIDS cases reported nationally continues to increase. The first 5,000 diagnosed cases were reported to CDC between June 1981 and June 1984 (37 months); the last 5,000 cases have been reported since June 1984 (10 months).

Haitian-born AIDS patients have now been placed into the "other/unknown" group. The previous separate listing for Haitian-born patients has been discontinued in light of current epidemiologic information that suggests both heterosexual contact and exposure to contaminated needles (not associated with intravenous [IV] drug abuse) play a role in disease transmission (*5-7*). Similar risk factors have been described for AIDS patients in some central African countries (*8-10*). Evidence from surveillance case report forms is insufficient to establish the specific modes of transmission in particular cases reported among Haitian immigrants.

Among Haitian-American control patients who were age- and sex-matched to patients with AIDS, the prevalence of antibody to human T-lymphotropic virus type III/lymphadenopathy-associated virus (HTLV-III/LAV) was 5% (7). While this seroprevalence is lower than that found in other patient groups, it is several times higher than that seen in random blood donors. The following U.S. Public Health Service guidelines continue to apply: blood and/or plasma should not be donated by persons with symptoms and signs of AIDS, sexual partners of AIDS patients, sexually active homosexual/bisexual men with multiple partners, Haitian entrants to the United States, present or past abusers of IV drugs, patients with hemophilia, and sexual partners of individuals at increased risk for AIDS (*11*).

The proportion of AIDS patients with a history of blood transfusion as their only risk factor

TABLE 2. Percent distribution of adult acquired immunodeficiency syndrome patients, by disease and date of report — United States, through April 1985

Disease*	Before May 1983	May 1983-April 1984	May 1984-April 1985	Total
KS, no PCP	24.7	24.1	18.9	**21.2**
KS and PCP	10.3	6.7	4.3	**5.8**
PCP, no KS	51.3	51.7	59.5	**56.1**
Other opportunistic diseases	13.7	17.5	17.2	**16.8**
Total	**100.0**	**100.0**	**100.0**	**100.0**

*KS = Kaposi's sarcoma; PCP = *Pneumocystis carinii* pneumonia

AIDS — Continued

has increased significantly during the last 2 years, although these cases still contribute less than 2% of the total. Because the time from infection with HTLV-III/LAV to onset of AIDS may be several years, persons exposed to the virus through transfusion before institution of the self-deferral guidelines for blood donors in 1983 and screening of blood for HTLV-III/LAV antibody in 1985 may remain at risk of AIDS.

Over 93% of all AIDS patients who have KS are homosexual/bisexual men (*12*). Although the proportion of homosexual/bisexual men reported with AIDS has been increasing, the proportion with KS has decreased significantly and has led to an overall decrease in the proportion of adult cases with KS. The reasons for the change in proportion of KS cases among homosexual/bisexual men are unclear.

Forty-five states, the District of Columbia, and Puerto Rico now require reporting of AIDS to health departments. Although the majority of cases have been reported from a few states, proportionately greater increases have recently been noted from other states. The geographic distribution of AIDS among children with parents in high-risk groups is similar to that seen for heterosexual adult AIDS patients. Since several years usually separate acquisition of infection with HTLV-III/LAV and onset of AIDS, current reports of AIDS cases may not reflect the present geographic distribution of infected persons.

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Cancer Patient Survival by Racial/Ethnic Group — United States, 1973-1979

To study the survival differences by race and ethnic group of patients with a first primary cancer, the National Cancer Institute analyzed data from its Surveillance, Epidemiology and End Results Program (SEER). The study included cases diagnosed in the period 1973-1979 and followed through December 31, 1981. Eight racial/ethnic groups in the U.S. population—Anglos, Hispanics, blacks, American Indians, Chinese, Japanese, Filipinos, and Hawaiians—were evaluated (*1*). At the time of the analysis, the SEER program included

Cancer Patient Survival — Continued

roughly 10% of the U.S. population (all residents of the states of Connecticut, Hawaii, Iowa, New Mexico, and Utah and the metropolitan areas of Atlanta, Georgia; Detroit, Michigan; San Francisco, California; and Seattle, Washington). Survival is reported as a 5-year relative survival rate, the ratio of the observed survival rate for the patient group to the expected survival rate for persons in the general population similar to the patient group in age, race, sex, and calendar year.

Survival rates for Anglo females exceeded those for Anglo males for each major primary site except urinary bladder (Table 3). The primary site with the highest survival rate among each group studied was the thyroid gland, which had a 5-year relative rate of 91% for all races combined. Rates were uniformly low (under 9%) for each racial/ethnic group and both sexes for cancers of the esophagus, liver, and pancreas. Survival rates for Hispanics were almost identical to those for Anglos, with the largest difference observed for females with bladder cancer. Black males experienced poorer survival than Anglo males for cancer of the rectum, prostate, bladder, and thyroid; black females had poorer survival than Anglo females for cancers of the bladder, corpus uteri, and breast. For many primary sites, Japanese experienced the highest survival rates, and American Indians, the lowest. Although numbers of cases are small, and the survival rates are unstable, survival rates for Chinese and Native Hawaiians are roughly comparable to those for Anglos, whereas survival rates for Filipinos resemble those for blacks.

TABLE 3. Five-year survival rates for patients with primary cancers, by racial/ethnic group and sex — U.S. Surveillance, Epidemiology and End Results Program areas, 1973-1979

Cancer, by sex	Survival rate (%)							
	White			American Indian	Chinese	Japanese	Filipino	Hawaiian
	Anglo	Hispanic	Black					
Males								
Stomach	12	19*	14*	7*	10*	25*	14*	16*
Colon	48	48	43	41*	48*	61	32*	56*
Rectum	46	39*	32	28*	55*	51	40*	58*
Lung/bronchus	11	10*	9	5*	15*	12*	11*	12*
Urinary bladder	73	70	52*	†	69*	79	42*	53*
Thyroid	90	94	76*	†	100	100	83*	92*
Prostate	66	68	56*	41*	72	74	70	76*
Females								
Stomach	16	10*	14*	7*	16*	29*	14*	11*
Colon	50	42	45	54*	55*	56	43*	57*
Rectum	48	47*	41	20*	38*	62	42*	32*
Lung/bronchus	15	14*	13	5*	15*	20*	9*	22*
Urinary bladder	71	47*	38*	†	†	53*	†	23*
Thyroid	92	93	93	98	94	99	97	87
Cervix uteri	67	70	62	66	63*	70	70*	75
Corpus uteri	87	87	56	68*	87	86	85	76
Breast	73	71	61	55*	75	84	68	76
Total primary cancer cases	**350,302**	**8,622**	**30,253**	**1,264**	**3,048**	**5,030**	**2,355**	**1,878**

*Number of cases is small; rate may be unstable.

†Number of cases is too small to yield a reliable rate.

Cancer Patient Survival — Continued

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Editorial Note: For a specific cancer site, survival time after diagnosis is related to the extent of disease at diagnosis (stage), the effectiveness of treatment, and biologic and behavioral differences. If the cancer is widespread at diagnosis (higher-stage disease), survival time decreases. However, the extent of disease at diagnosis does not completely account for these differences in survival. For breast cancer in each stage, whites had higher survival rates than blacks.

Japanese patients have consistently higher survival rates than Anglo patients. Since 83% of the Japanese included in this analysis were residents of Hawaii, and survival rates of Anglo patients in Hawaii exceeded those of their Anglo counterparts on the mainland, the high rate for Japanese patients may primarily reflect the general high survival rates among patient groups in Hawaii.

The effect of socioeconomic status (SES) on cancer patient survival may partially explain these racial differences. A study of white cancer patients in Iowa demonstrated poorer survival among those of low SES, like those of blacks elsewhere (*2*). Likewise, in a study of breast

(Continued on page 255)

TABLE I. Summary—cases of specified notifiable diseases, United States

Disease	18th Week Ending			Cumulative, 18th Week Ending		
	May 4, 1985	May 5, 1984	Median 1980-1984	May 4 1985	May 5, 1984	Median 1980-1984
Acquired Immunodeficiency Syndrome (AIDS)	85	90	N	2,312	1,283	N
Aseptic meningitis	79	65	75	1,224	1,358	1,358
Encephalitis: Primary (arthropod-borne & unspec.)	23	20	18	304	284	284
Post-infectious	3	3	3	48	35	35
Gonorrhea: Civilian	14,897	14,058	18,226	269,974	277,477	319,607
Military	319	248	442	6,255	6,905	9,197
Hepatitis: Type A	380	370	440	7,298	7,205	7,932
Type B	455	476	464	8,487	8,488	7,146
Non A, Non B	69	96	N	1,418	1,263	N
Unspecified	102	114	157	1,809	1,651	2,922
Legionellosis	7	14	N	182	173	N
Leprosy	9	4	4	123	75	75
Malaria	15	21	19	237	242	280
Measles: Total*	67	106	106	960	1,125	1,125
Indigenous	43	99	N	713	1,001	N
Imported	24	7	N	247	124	N
Meningococcal infections: Total	58	62	62	1,054	1,236	1,236
Civilian	58	62	62	1,052	1,234	1,234
Military	-	-	-	2	2	5
Mumps	74	90	112	1,432	1,315	1,927
Pertussis	17	40	40	439	724	378
Rubella (German measles)	17	27	87	155	257	1,037
Syphilis (Primary & Secondary): Civilian	495	529	529	8,620	9,819	10,366
Military	2	4	5	67	117	125
Toxic Shock syndrome	11	10	N	130	165	N
Tuberculosis	400	363	454	6,751	6,969	8,417
Tularemia	-	10	4	24	33	37
Typhoid fever	14	11	5	96	116	126
Typhus fever, tick-borne (RMSF)	11	15	17	29	53	53
Rabies, animal	107	79	155	1,640	1,644	2,104

TABLE II. Notifiable diseases of low frequency, United States

	Cum 1985		Cum 1985
Anthrax	-	Leptospirosis	8
Botulism: Foodborne	2	Plague	-
Infant (Calif. 1)	15	Poliomyelitis: Total	1
Other	-	Paralytic	1
Brucellosis (Va. 1, Tex. 1)	30	Psittacosis	44
Cholera	-	Rabies, human	-
Congenital rubella syndrome	-	Tetanus	20
Congenital syphilis, ages < 1 year	52	Trichinosis	28
Diphtheria (Calif. 1)	2	Typhus fever, flea-borne (endemic, murine)	3

*Twenty of the 67 reported cases for this week were imported from a foreign country or can be directly traceable to a known internationally imported case within two generations.

TABLE III. Cases of specified notifiable diseases, United States, weeks ending May 4, 1985 and May 5, 1984 (18th Week)

Reporting Area	AIDS	Aseptic Menin-gitis	Encephalitis		Gonorrhea (Civilian)		Hepatitis (Viral), by type				Legionel-losis	Leprosy
			Primary	Post-in-fectious			A	B	NA,NB	Unspeci-fied		
	Cum. 1985	1985	Cum. 1985	Cum. 1985	Cum. 1985	Cum. 1984	1985	1985	1985	1985	1985	Cum. 1985
UNITED STATES	2,312	79	304	48	269,974	277,477	380	455	69	102	7	123
NEW ENGLAND	69	1	8	-	8,270	8,049	3	22	1	8	-	3
Maine	3	-	-	-	338	298	-	4	-	-	-	-
N.H.	-	-	2	-	173	218	-	-	-	-	-	-
Vt.	-	-	-	-	85	131	-	-	-	-	-	-
Mass.	44	-	6	-	3,058	3,213	3	16	1	8	-	3
R.I.	3	1	-	-	611	500	-	2	-	-	-	-
Conn.	19	-	-	-	4,005	3,689	-	-	-	-	-	-
MID ATLANTIC	907	8	47	1	37,612	37,808	15	45	4	5	-	10
Upstate N.Y.	122	2	16	1	5,328	5,878	3	9	-	4	-	-
N.Y. City	609	3	3	-	17,161	16,117	-	1	-	-	-	10
N.J.	113	-	11	-	7,177	5,985	5	20	2	1	-	-
Pa.	63	3	17	-	7,946	9,828	7	15	2	-	-	-
E.N. CENTRAL	104	10	71	11	38,504	37,676	18	36	12	3	1	3
Ohio	23	1	27	4	9,750	9,683	6	12	2	2	1	2
Ind.	4	-	12	1	3,864	4,490	2	12	-	1	-	-
Ill.	43	1	8	4	10,849	8,518	2	2	1	-	-	-
Mich.	21	8	20	-	11,016	10,713	8	10	9	-	-	1
Wis.	13	-	4	2	3,025	4,272	-	-	-	-	-	-
W.N. CENTRAL	25	5	26	3	13,685	13,162	15	8	2	-	-	-
Minn.	4	1	11	1	2,001	1,909	3	1	1	-	-	-
Iowa	3	-	9	-	1,462	1,561	6	-	-	-	-	-
Mo.	15	-	-	-	6,340	6,161	-	4	1	-	-	-
N. Dak.	-	-	-	1	94	137	2	-	-	-	-	-
S. Dak.	-	-	-	-	252	344	3	-	-	-	-	-
Nebr.	-	-	1	-	1,304	968	-	-	-	-	-	-
Kans.	3	4	5	1	2,232	2,082	1	3	-	-	-	-
S. ATLANTIC	331	13	32	15	57,701	70,428	26	111	10	11	4	2
Del.	6	1	1	-	1,299	1,206	1	1	-	-	-	-
Md.	34	1	9	1	9,487	8,112	1	9	1	-	-	-
D.C.	40	-	-	-	4,916	5,122	1	4	-	1	-	-
Va.	19	-	6	4	6,210	6,631	1	34	-	1	2	-
W. Va.	1	-	2	-	854	838	-	3	-	-	1	-
N.C.	19	5	11	-	10,364	11,150	1	10	3	4	1	1
S.C.	2	-	3	-	7,102	6,725	1	13	-	1	-	-
Ga.	50	-	-	-	-	14,039	1	3	2	-	-	-
Fla.	160	6	-	10	17,469	16,605	19	34	4	4	-	1
E.S. CENTRAL	22	10	12	4	23,472	23,660	4	30	-	-	-	-
Ky.	9	3	4	-	2,574	2,782	1	6	-	-	-	-
Tenn.	3	-	4	-	9,240	9,565	1	10	-	-	-	-
Ala.	9	7	4	4	7,375	7,732	-	10	-	-	-	-
Miss.	1	-	-	-	4,283	3,581	2	4	-	-	-	-
W.S. CENTRAL	191	11	29	1	38,870	38,373	48	25	1	13	-	11
Ark.	2	-	1	1	3,656	3,352	-	-	-	-	-	-
La.	30	-	1	-	8,544	8,370	-	-	1	-	-	1
Okla.	2	-	11	-	3,928	4,131	17	2	-	2	-	-
Tex.	157	11	16	-	22,742	22,520	31	23	-	11	-	10
MOUNTAIN	35	-	10	3	8,875	8,641	34	29	1	7	2	1
Mont.	-	-	-	-	264	405	1	2	-	-	1	-
Idaho	-	-	-	-	294	405	-	-	-	-	-	-
Wyo.	-	-	1	-	220	268	-	-	-	-	-	-
Colo.	12	-	3	-	2,665	2,508	3	5	-	2	-	-
N. Mex.	4	-	-	-	1,055	985	11	11	1	1	-	-
Ariz.	14	-	1	-	2,635	2,209	3	5	-	2	1	-
Utah	2	-	5	3	362	471	2	1	-	-	-	-
Nev.	3	-	-	-	1,380	1,390	14	5	-	2	-	1
PACIFIC	628	21	69	10	42,985	39,680	217	149	38	55	-	93
Wash.	37	-	6	-	2,870	2,834	19	11	1	3	-	19
Oreg.	10	-	-	-	2,194	2,251	76	10	4	-	-	2
Calif.	566	15	63	10	36,192	32,940	121	121	30	52	-	65
Alaska	2	-	-	-	1,063	987	-	1	-	-	-	-
Hawaii	13	6	-	-	666	668	1	6	3	-	-	7
Guam	-	U	-	-	33	95	U	U	U	U	U	-
P.R.	32	5	3	1	1,313	1,188	2	5	-	-	-	2
V.I.	1	U	-	-	130	157	U	U	U	U	U	-
Pac. Trust Terr.	-	U	-	-	-	-	U	U	U	U	U	-

N: Not notifiable U: Unavailable

TABLE III. (Cont'd.) Cases of specified notifiable diseases, United States, weeks ending May 4, 1985 and May 5, 1984 (18th Week)

Reporting Area	Malaria	Measles (Rubeola)					Menin-gococcal Infections	Mumps		Pertussis			Rubella		
		Indigenous		Imported *		Total									
	Cum. 1985	1985	Cum. 1985	1985	Cum. 1985	Cum. 1984	Cum. 1985	1985	Cum. 1985	1985	Cum. 1985	Cum. 1984	1985	Cum. 1985	Cum. 1984
UNITED STATES	237	43	713	24	247	1,125	1,054	74	1,432	17	439	724	17	155	257
NEW ENGLAND	11	-	10	19	78	44	49	2	30	1	24	12	1	6	13
Maine	-	-	-	-	-	-	2	1	4	-	2	-	-	-	1
N.H.	-	-	-	-	-	13	5	-	5	-	13	3	-	2	-
Vt.	-	-	-	-	-	2	8	-	2	-	2	5	-	-	-
Mass.	8	-	10	18 †	76	27	9	-	15	1	4	3	1	4	12
R.I.	1	-	-	-	-	-	9	-	2	-	1	1	-	-	-
Conn.	2	-	-	1 †	2	2	16	1	2	-	2	-	-	-	-
MID ATLANTIC	37	5	58	3	15	40	180	8	154	5	51	45	3	38	68
Upstate N.Y.	14	2	29	3 §	5	5	78	3	89	-	21	27	-	8	53
N.Y. City	10	1	19	-	5	26	23	-	14	1	9	1	3	13	8
N.J.	4	-	2	-	5	5	28	-	17	-	1	3	-	5	7
Pa.	9	2	8	-	-	4	51	5	34	4	20	14	-	12	-
E.N. CENTRAL	10	-	147	-	94	415	186	15	604	-	52	222	-	9	43
Ohio	2	-	-	-	13	2	61	6	177	-	13	35	-	-	2
Ind.	1	-	-	-	1	3	28	-	24	-	11	150	-	-	1
Ill.	-	-	74	-	66	134	37	1	104	-	9	16	-	3	22
Mich.	7	-	34	-	14	267	43	8	247	-	7	11	-	5	11
Wis.	-	-	39	-	-	9	17	-	52	-	12	10	-	1	7
W.N. CENTRAL	5	-	1	-	4	1	47	4	47	1	44	67	-	7	17
Minn.	1	-	-	-	2	1	12	-	1	-	11	4	-	-	1
Iowa	1	-	-	-	-	-	7	-	7	-	3	3	-	-	-
Mo.	1	-	-	-	2	-	19	1	7	1	9	12	-	-	-
N. Dak.	1	-	-	-	-	-	-	-	1	-	6	-	-	-	3
S. Dak.	1	-	-	-	-	-	1	-	-	-	-	1	-	-	-
Nebr.	-	-	-	-	-	-	2	-	-	-	-	2	-	-	-
Kans.	-	-	1	-	-	-	6	3	31	-	15	45	-	7	13
S. ATLANTIC	31	10	119	1	6	16	203	10	116	1	94	56	7	23	16
Del.	-	-	-	- §	-	-	5	-	1	-	-	-	-	-	-
Md.	10	3	12	1	4	7	24	2	15	-	22	3	-	1	1
D.C.	3	-	-	-	1	-	6	-	-	-	-	-	-	-	-
Va.	7	4	15	-	1	2	33	2	18	-	3	7	1	1	-
W. Va.	1	-	3	-	-	-	4	2	35	-	-	6	4	6	-
N.C.	2	1	1	-	-	-	28	1	8	-	7	17	-	-	-
S.C.	-	-	-	-	-	-	20	1	6	-	-	2	-	2	-
Ga.	1	-	8	-	-	-	30	-	12	-	37	6	-	4	2
Fla.	7	2	80	-	-	7	53	2	21	1	25	15	2	9	13
E.S. CENTRAL	3	-	-	-	-	3	53	-	10	-	4	3	-	1	5
Ky.	1	-	-	-	-	1	3	-	1	-	1	1	-	1	1
Tenn.	-	-	-	-	-	2	19	-	8	-	1	2	-	-	-
Ala.	2	-	-	-	-	-	18	-	-	-	2	-	-	-	1
Miss.	-	-	-	-	-	-	13	-	1	-	-	-	-	-	3
W.S. CENTRAL	16	16	60	1	6	212	92	4	144	3	47	152	1	15	5
Ark.	-	-	-	-	-	-	9	1	4	-	9	10	-	1	2
La.	-	6	7	-	-	-	14	-	2	-	2	3	-	-	-
Okla.	-	-	-	-	-	4	14	N	N	3	36	130	-	-	-
Tex.	16	10	53	1 †	6	208	55	3	138	-	-	9	1	14	3
MOUNTAIN	11	11	244	-	23	113	56	17	133	-	22	55	-	3	8
Mont.	-	5	121	-	17	-	3	1	5	-	3	16	-	-	-
Idaho	-	-	-	-	1	-	-	1	5	-	-	1	-	1	1
Wyo.	-	-	-	-	-	-	5	-	2	-	-	3	-	-	1
Colo.	3	-	-	-	5	-	15	-	14	-	8	18	-	-	-
N. Mex.	4	-	-	-	-	86	8	N	N	-	3	5	-	1	-
Ariz.	3	6	123	-	-	-	16	7	58	-	4	8	-	1	-
Utah	-	-	-	-	-	27	7	-	2	-	4	2	-	-	6
Nev.	1	-	-	-	-	-	2	8	47	-	-	2	-	-	-
PACIFIC	113	1	74	-	21	281	188	14	194	6	101	112	5	53	82
Wash.	9	-	1	-	-	80	33	1	12	1	16	14	2	2	1
Oreg.	4	-	3	-	-	-	21	N	N	-	16	9	-	2	-
Calif.	83	1	67	-	17	199	129	13	171	5	65	33	3	37	79
Alaska	2	-	-	-	-	-	4	-	2	-	1	-	-	-	-
Hawaii	15	-	3	-	4	2	1	-	9	-	3	56	-	12	2
Guam	-	U	10	U	-	84	-	U	2	U	-	-	U	1	2
P.R.	-	-	40	-	-	-	6	3	61	-	1	-	2	8	4
V.I.	-	U	4	U	5	-	-	U	3	U	-	-	U	-	-
Pac. Trust Terr.	-	U	-	U	-	-	-	U	-	U	-	-	U	-	-

*For measles only, imported cases includes both out-of-state and international importations.

N: Not notifiable U: Unavailable †International §Out-of-state

TABLE III. (Cont'd.) Cases of specified notifiable diseases, United States, weeks ending May 4, 1985 and May 5, 1984 (18th Week)

Reporting Area	Syphilis (Civilian) (Primary & Secondary)		Toxic-shock Syndrome	Tuberculosis		Tula-remia	Typhoid Fever	Typhus Fever (Tick-borne) (RMSF)	Rabies, Animal
	Cum. 1985	Cum. 1984	1985	Cum. 1985	Cum. 1984	Cum. 1985	Cum. 1985	Cum. 1985	Cum. 1985
UNITED STATES	8,620	9,819	11	6,751	6,969	24	96	29+11	1,640
NEW ENGLAND	184	213	1	227	192	-	6	-	-
Maine	7	1	-	16	9	-	-	-	-
N.H.	3	2	-	-	12	-	-	-	-
Vt.	-	1	-	4	2	-	-	-	-
Mass.	99	129	1	143	106	-	5	-	-
R.I.	6	8	-	21	17	-	-	-	-
Conn.	69	72	-	43	46	-	1	-	-
MID ATLANTIC	1,140	1,340	-	1,265	1,303	1	16	-	138
Upstate N.Y.	88	113	-	202	204	-	6	-	30
N.Y. City	704	801	-	652	531	1	4	-	-
N.J.	243	249	-	129	265	-	5	-	3
Pa.	105	177	-	282	303	-	1	-	105
E.N. CENTRAL	417	468	1	855	924	-	9	1+1	40
Ohio	53	85	1	147	196	-	2	1	10
Ind.	34	57	-	103	99	-	3	-	5
Ill.	214	134	-	369	372	-	1	-	7
Mich.	96	160	-	192	199	-	2	-	1
Wis.	20	32	-	44	58	-	1	-	17
W.N. CENTRAL	90	171	3	170	185	7	3	-	251
Minn.	23	44	-	34	29	1	3	-	52
Iowa	14	10	-	28	29	-	-	-	58
Mo.	35	92	-	75	83	5	-	-	16
N. Dak.	-	1	-	2	5	-	-	-	28
S. Dak.	4	-	-	7	6	-	-	-	60
Nebr.	5	8	-	8	9	1	-	-	16
Kans.	9	16	3	16	24	-	-	-	21
S. ATLANTIC	2,118	2,997	-	1,381	1,457	5	11	17+5	463
Del.	16	9	-	13	16	1	-	-	-
Md.	143	197	-	117	163	-	2	2	233
D.C.	126	109	-	67	43	-	-	-	-
Va.	117	154	-	114	138	-	2	2 2	66
W. Va.	4	8	-	32	54	-	-	1 1	8
N.C.	248	306	-	174	234	4	1	9 2	1
S.C.	254	288	-	166	158	-	-	2	23
Ga.	-	514	-	206	207	-	-	-	63
Fla.	1,210	1,412	-	492	444	-	6	1	69
E.S. CENTRAL	793	600	-	589	645	2	2	4	88
Ky.	31	31	-	98	140	-	-	-	12
Tenn.	219	156	-	182	207	2	-	1	22
Ala.	244	201	-	210	212	-	2	3	52
Miss.	299	212	-	99	86	-	-	-	2
W.S. CENTRAL	2,195	2,300	1	705	734	2	5	7+5	344
Ark.	113	74	-	83	80	1	-	-	58
La.	363	423	-	96	100	-	-	-	4
Okla.	60	66	1	80	71	1	-	7 5	43
Tex.	1,659	1,737	-	446	483	-	5	-	239
MOUNTAIN	286	228	-	170	164	5	4	-	127
Mont.	1	-	-	19	8	1	-	-	68
Idaho	2	9	-	6	9	-	-	-	-
Wyo.	4	3	-	3	-	-	-	-	3
Colo.	63	51	-	18	16	-	3	-	-
N. Mex.	36	29	-	32	36	2	1	-	1
Ariz.	163	96	-	81	73	-	-	-	55
Utah	3	7	-	5	10	2	-	-	-
Nev.	14	33	-	6	12	-	-	-	-
PACIFIC	1,397	1,502	5	1,389	1,365	2	40	-	189
Wash.	35	51	-	64	67	-	-	-	1
Oreg.	32	44	-	48	57	1	-	-	-
Calif.	1,302	1,378	5	1,161	1,147	1	39	-	188
Alaska	1	3	-	51	22	-	-	-	-
Hawaii	27	26	-	65	72	-	1	-	-
Guam	2	-	U	6	20	-	-	-	-
P.R.	310	295	-	108	131	-	1	-	12
V.I.	1	6	U	1	3	-	-	-	-
Pac. Trust Terr.	-	-	U	-	-	-	-	-	-

U: Unavailable

TABLE IV. Deaths in 121 U.S. cities,* week ending May 4, 1985 (18th Week)

Reporting Area	All Causes, By Age (Years)						P&I** Total
	All Ages	≥65	45-64	25-44	1-24	<1	
NEW ENGLAND	734	482	170	52	9	21	46
Boston, Mass.	204	118	51	23	5	7	14
Bridgeport, Conn.	44	29	11	4	-	-	2
Cambridge, Mass.	27	20	7	-	-	-	5
Fall River, Mass.	27	20	5	2	-	-	1
Hartford, Conn.	67	38	19	7	-	3	1
Lowell, Mass.	28	23	3	1	1	-	2
Lynn, Mass.	19	13	5	1	-	-	1
New Bedford, Mass.	28	19	6	3	-	-	-
New Haven, Conn.	71	52	14	2	1	2	4
Providence, R.I.	74	51	17	3	-	3	7
Somerville, Mass.	7	5	2	-	-	-	1
Springfield, Mass.	44	26	13	-	-	5	1
Waterbury, Conn.	25	18	6	-	1	-	3
Worcester, Mass.	69	50	11	6	1	1	4
MID ATLANTIC	2,528	1,665	523	210	54	76	107
Albany, N.Y.	45	29	8	2	1	5	1
Allentown, Pa.	16	15	-	1	-	-	-
Buffalo, N.Y.	131	96	18	6	3	8	4
Camden, N.J.	39	27	5	2	2	3	-
Elizabeth, N.J.	19	15	3	1	-	-	-
Erie, Pa.†	38	28	7	1	1	1	4
Jersey City, N.J.	50	29	12	9	-	-	2
N.Y. City, N.Y.	1,319	843	279	127	33	37	52
Newark, N.J.	45	25	9	8	1	2	3
Paterson, N.J.	31	22	4	3	-	2	2
Philadelphia, Pa.	398	250	101	29	9	9	17
Pittsburgh, Pa.†	58	39	16	1	-	2	4
Reading, Pa.	30	24	1	4	1	-	3
Rochester, N.Y.	112	79	19	8	2	4	8
Schenectady, N.Y.	42	29	13	-	-	-	3
Scranton, Pa.†	25	18	5	-	-	2	1
Syracuse, N.Y.	67	52	11	2	1	1	-
Trenton, N.J.	18	10	4	4	-	-	1
Utica, N.Y.	22	17	3	2	-	-	-
Yonkers, N.Y.	23	18	5	-	-	-	2
E.N. CENTRAL	2,195	1,525	375	130	58	106	107
Akron, Ohio	66	47	10	7	1	1	2
Canton, Ohio	37	29	4	2	1	1	1
Chicago, Ill.§	553	462	11	26	16	37	16
Cincinnati, Ohio	141	95	29	2	4	11	24
Cleveland, Ohio	147	92	35	10	5	5	4
Columbus, Ohio	119	74	27	6	5	7	6
Dayton, Ohio	104	67	30	4	1	2	2
Detroit, Mich.	254	141	61	36	4	12	10
Evansville, Ind.	48	36	11	-	1	-	2
Fort Wayne, Ind.	32	21	11	-	-	-	1
Gary, Ind.	10	4	4	2	-	-	-
Grand Rapids, Mich	51	39	8	1	-	3	3
Indianapolis, Ind.	159	98	37	13	6	5	2
Madison, Wis.	37	25	5	3	2	2	-
Milwaukee, Wis.	123	81	31	5	3	3	7
Peoria, Ill.	55	41	6	1	1	6	4
Rockford, Ill.	48	27	10	4	3	4	4
South Bend, Ind.	52	35	11	4	1	1	8
Toledo, Ohio	101	75	20	1	3	2	10
Youngstown, Ohio	58	36	14	3	1	4	1
W.N. CENTRAL	732	508	144	33	25	22	38
Des Moines, Iowa	76	57	17	1	1	-	10
Duluth, Minn.	24	19	3	1	-	1	1
Kansas City, Kans.	44	23	13	5	3	-	-
Kansas City, Mo.	104	73	21	5	1	4	3
Lincoln, Nebr.	35	24	8	2	1	-	3
Minneapolis, Minn.	97	66	19	3	3	6	1
Omaha, Nebr.	76	49	16	5	4	2	7
St. Louis, Mo.	140	104	21	6	4	5	4
St. Paul, Minn.	70	50	11	3	5	1	1
Wichita, Kans.	66	43	15	2	3	3	8

Reporting Area	All Causes, By Age (Years)						P&I** Total
	All Ages	≥65	45-64	25-44	1-24	<1	
S. ATLANTIC	1,352	792	317	125	58	54	55
Atlanta, Ga.	162	86	37	16	9	14	4
Baltimore, Md.	296	175	70	25	15	11	9
Charlotte, N.C.	70	40	21	3	5	1	5
Jacksonville, Fla.	117	79	25	6	3	3	12
Miami, Fla.	84	50	22	7	4	1	-
Norfolk, Va.	48	21	10	11	3	3	4
Richmond, Va.	71	45	22	2	2	-	5
Savannah, Ga.	26	19	5	-	2	-	2
St. Petersburg, Fla.	80	69	6	2	1	2	1
Tampa, Fla.	76	45	15	2	3	7	6
Washington, D.C.	298	148	79	49	9	12	7
Wilmington, Del.	24	15	5	2	2	-	-
E.S. CENTRAL	764	467	186	53	23	35	36
Birmingham, Ala.	112	64	37	6	2	3	-
Chattanooga, Tenn.	71	56	13	1	1	-	4
Knoxville, Tenn.	89	49	29	6	3	2	7
Louisville, Ky.	111	69	29	10	2	1	8
Memphis, Tenn.	160	86	34	12	8	20	10
Mobile, Ala.	66	44	14	5	2	1	2
Montgomery, Ala.	52	37	9	3	1	2	3
Nashville, Tenn.	103	62	21	10	4	6	2
W.S. CENTRAL	1,396	786	340	153	60	57	56
Austin, Tex.	53	29	10	6	4	4	1
Baton Rouge, La.	34	21	6	1	2	4	-
Corpus Christi, Tex.	36	26	7	1	2	-	-
Dallas, Tex.	186	85	62	20	10	9	6
El Paso, Tex.	53	26	18	3	2	4	3
Fort Worth, Tex.	83	46	20	8	3	6	10
Houston, Tex.	463	236	115	74	21	17	9
Little Rock, Ark.	23	13	4	1	2	3	1
New Orleans, La.	127	81	22	16	4	4	-
San Antonio, Tex.	199	125	50	15	6	3	15
Shreveport, La.	43	30	10	3	-	-	3
Tulsa, Okla.	96	68	16	5	4	3	8
MOUNTAIN	654	407	142	45	32	28	37
Albuquerque, N.Mex.	81	45	18	7	7	4	5
Colo. Springs, Colo.	38	20	13	3	2	-	3
Denver, Colo.	118	70	31	9	2	6	8
Las Vegas, Nev.	92	55	21	7	4	5	4
Ogden, Utah	27	19	5	2	1	-	3
Phoenix, Ariz.	123	79	22	6	10	6	4
Pueblo, Colo.	17	12	5	-	-	-	-
Salt Lake City, Utah	56	38	7	4	3	4	1
Tucson, Ariz.	102	69	20	7	3	3	9
PACIFIC	1,830	1,214	368	136	58	51	113
Berkele, Calif.	20	17	2	-	-	1	1
Fresno, Calif.	68	36	16	5	4	7	4
Glendale, Calif.	19	11	4	3	1	-	1
Honolulu, Hawaii	69	50	13	3	1	2	12
Long Beach, Calif.	101	69	27	3	1	1	6
Los Angeles, Calif.	444	275	108	38	14	6	12
Oakland, Calif.	68	38	17	8	4	1	3
Pasadena, Calif.	41	32	2	4	-	3	5
Portland, Oreg.	117	82	21	8	3	3	2
Sacramento, Calif.	147	108	24	6	5	4	9
San Diego, Calif.	131	84	27	11	5	4	17
San Francisco, Calif.	162	111	23	19	3	6	7
San Jose, Calif.	190	120	39	13	11	7	16
Seattle, Wash.	151	99	34	10	3	5	6
Spokane, Wash.	59	48	6	3	1	1	9
Tacoma, Wash.	43	34	5	2	2	-	3
TOTAL	12,185††	7,846	2,565	937	377	450	595

* Mortality data in this table are voluntarily reported from 121 cities in the United States, most of which have populations of 100,000 or more A death is reported by the place of its occurrence and by the week that the death certificate was filed. Fetal deaths are not included.

** Pneumonia and influenza.

† Because of changes in reporting methods in these 3 Pennsylvania cities, these numbers are partial counts for the current week. Complete counts will be available in 4 to 6 weeks.

††Total includes unknown ages.

§ Data not available. Figures are estimates based on average of past 4 weeks.

Cancer Patient Survival — Continued

cancer in blacks, using six different indicators of SES, blacks of lower SES experienced poorer survival than blacks of higher SES (*3*).

These differences in SES may be related to differences in treatment. In a randomized trial in New York to determine the efficacy of breast screening, the unscreened control group showed a lower 5-year survival rate for nonwhite women with breast cancer than for white women with breast cancer. In the screened group, the breast cancer survival rates of the two racial groups did not differ (*4*). In a Veterans Administration study, except for bladder cancer, patient survival did not differ by race (*5*). It appears that treatment differentials may play a role in the differences in survival observed among ethnic groups. In the Veterans Administration study, in which patients of all races were treated similarly, most survival differentials did not exist. Studies are currently under way to investigate the role of additional factors in the survival differentials of the racial/ethnic groups.

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Recommendation of the Immunization Practices Advisory Committee (ACIP)

Meningococcal Vaccines

INTRODUCTION

A polysaccharide vaccine against disease caused by *Neisseria meningitidis* serogroups A, C, Y, and W-135 is currently licensed in the United States. This statement updates the previous statement (*MMWR* 1978;27:327-9), summarizes available information on the vaccine, and offers guidelines for its use in the civilian population of the United States.

MENINGOCOCCAL DISEASE

N. meningitidis causes both endemic and epidemic disease, principally meningitis and meningococcemia. It is the second most common cause of bacterial meningitis in the United States (approximately 20% of all cases), affecting an estimated 3,000-4,000 people each year. The case-fatality rate is approximately 10% for meningococcal meningitis and 20% for meningococcemia, despite therapy with antimicrobial agents, such as penicillin, to which all strains remain highly sensitive.

No major epidemic of meningococcal disease has occurred in the United States since 1946, although localized community outbreaks have been reported. The incidence of endemic meningococcal disease peaks in the late winter to early spring. Attack rates are highest among children aged 6-12 months and then steadily decline; by age 5 years, the incidence approximates that for adults. Serogroup B, for which a vaccine is not yet available, accounts for

Meningococcal Vaccines – Continued

50%-55% of all cases; serogroup C, for 20%-25%; and serogroup W-135, for 15%. Serogroups Y (10%) and A (1%-2%) account for nearly all remaining cases. Serogroup W-135 has emerged as a major cause of disease only since 1975 (*1*). While serogroup A causes only a small proportion of endemic disease in the United States, it is the most common cause of epidemics elsewhere. Less commonly, serogroups C and B can also cause epidemic disease.

People with certain chronic conditions appear to be at increased risk of developing meningococcal infection. Meningococcal disease is particularly common among individuals with component deficiencies in the final common complement pathway (C3, C5-C9), many of whom experience multiple episodes of infection (*2*). Asplenic persons seem also to be at increased risk of developing meningococcal disease and experience particularly severe infections (*3*). It is uncertain whether individuals with other diseases associated with immunosuppression are at higher risk of acquiring meningococcal disease, as they are for disease caused by other encapsulated bacteria. In the past, new military recruits were at especially high risk, particularly for serogroup C disease; however, since routine vaccination of recruits with the bivalent A/C vaccine began in 1971, disease caused by those serogroups has been uncommon. Military recruits currently receive the A,C,Y,W-135 vaccine.

MENINGOCOCCAL POLYSACCHARIDE VACCINES

The recently licensed quadrivalent A,C,Y,W-135 vaccine (Menomune®—A/C/Y/W-135, manufactured by Squibb-Connaught) is the formulation currently available in the United States. The vaccine consists of 50 μg each of the respective purified bacterial capsular polysaccharides.

Vaccine efficacy. Numerous studies have demonstrated the immunogenicity and clinical efficacy of the A and C vaccines. The serogroup A polysaccharide induces antibody in some children as young as 3 months of age, although a response comparable to that seen in adults is not achieved until 4 or 5 years of age; the serogroup C component does not induce a good antibody response before age 18-24 months (*4,5*). The serogroup A vaccine has been shown to have a clinical efficacy of 85%-95% and to be of use in controlling epidemics. A similar level of clinical efficacy has been demonstrated for the serogroup C vaccine, both in American military recruits and in an epidemic. The group Y and W-135 polysaccharides have been shown to be safe and immunogenic in adults (*6-9*) and in children over 2 years of age; clinical protection has not been demonstrated directly, but is assumed, based on the production of bactericidal antibody, which for group C has been correlated with clinical protection. The antibody responses to each of the four polysaccharides in the quadrivalent vaccine are serogroup-specific and independent.

Duration of efficacy. Antibodies against the group A and C polysaccharides decline markedly over the first 3 years following a single dose of vaccine (*5,10-13*). This antibody decline is more rapid in infants and young children than in adults. Similarly, while vaccine-induced clinical protection probably persists in schoolchildren and adults for at least 3 years, a recent study in Africa has demonstrated a marked decline in the efficacy of the group A vaccine in young children over time. In this study, efficacy declined from greater than 90% to less than 10% over 3 years in those under 4 years of age at the time of vaccination; in older children, efficacy was still 67% 3 years after vaccination (*14*).

RECOMMENDATIONS FOR VACCINE USE

Routine vaccination of civilians with meningococcal polysaccharide vaccine is not recommended for the following reasons: (1) the risk of infection in the United States is low; (2) a vaccine against serogroup B, the major cause of meningococcal disease in the United States, is not

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yet available; and (3) much of the meningococcal disease in the United States occurs among children too young to benefit from the vaccine. However, the vaccine has been shown to be of use in aborting outbreaks due to serogroups represented in the vaccine and should be used in their control. In an outbreak, the serogroup should be determined and the population at risk delineated by neighborhood, school, dormitory, or other reasonable boundary. Although endemic disease is very uncommon above age 5 years, older children, adolescents, and young adults constitute a higher proportion of cases during epidemics and may warrant vaccination during an outbreak (*15*).

Routine immunization with the quadrivalent vaccine is recommended for particular high-risk groups, including individuals with terminal complement component deficiencies and those with anatomic or functional asplenia. Persons splenectomized because of trauma or nonlymphoid tumors and those with inherited complement deficiencies have acceptable antibody responses to meningococcal vaccine, although clinical efficacy has not been documented (*2,16*). It should be recognized that such individuals frequently have preexisting antibody against *N. meningitidis* and may not be protected by vaccination.

Vaccination with the A-C vaccine may benefit some travelers to countries recognized as having hyperendemic or epidemic disease and Americans living in these areas, particularly those who will have prolonged contact with the local populace. One area of the world recognized as having recurrent epidemics of meningococcal disease is the part of sub-Saharan Africa known as the "meningitis belt," which extends from Mauritania in the west to Ethiopia in the east. Epidemics have been recognized in other parts of the world, and updated information can be obtained from travelers' clinics, state health departments, and CDC.

Primary Immunization. For both adults and children, vaccine is administered subcutaneously as a single 0.5-ml dose. The vaccine can be given at the same time as other immunizations, if needed. Good antibody levels are achieved within 10-14 days after vaccination.

PRECAUTIONS AND CONTRAINDICATIONS

Reactions. Adverse reactions to meningococcal vaccine are mild and infrequent, consisting principally of localized erythema lasting 1-2 days. Up to 2% of young children develop fever transiently after vaccination (*13*).

Pregnancy. On theoretical grounds, it is prudent not to immunize pregnant women unless there is a substantial risk of infection. However, evaluation of the vaccine in pregnant women during an epidemic in Brazil demonstrated no adverse effects. Further, antibody studies in these women showed good antibody levels in maternal and cord blood following vaccination during any trimester; antibody levels in the infants declined over the first few months and did not affect their subsequent response to immunization (*17*).

REVACCINATION

Revaccination may be indicated for individuals at high risk of infection, particularly children who were first immunized under 4 years of age; such children should be considered for revaccination after 2 or 3 years if they remain at high risk. The need for revaccination in older children and adults remains unknown.

PROSPECTS FOR FUTURE MENINGOCOCCAL VACCINES

Work is continuing on a serogroup B meningococcal vaccine, as well as on improved A and C vaccines. Candidate vaccines include capsular polysaccharides complexed with meningococcal outer-membrane proteins or covalently linked to carrier proteins. Clinical efficacy data for these vaccines are not available.

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ANTIMICROBIAL CHEMOPROPHYLAXIS

Antimicrobial chemoprophylaxis of intimate contacts remains the chief preventive measure in sporadic cases of *N. meningitidis* disease in the United States. Intimate contacts include (1) household members, (2) day-care-center contacts, and (3) anyone directly exposed to the patient's oral secretions, such as through mouth-to-mouth resuscitation or kissing. The attack rate for household contacts is 0.3%-1%, 300-1,000 times the rate in the general population.

Unless the causative organism is known to be sensitive to sulfadiazine, the drug of choice is rifampin, given twice daily for 2 days (600 mg every 12 hours to adults; 10 mg/kg every 12 hours to children 1 month of age or older; 5 mg/kg every 12 hours to children under 1 month of age). Rifampin has been shown to be 90% effective in eradicating nasopharyngeal carriage. No serious adverse effects have been noted. However, rifampin prophylaxis is not recommended for pregnant women, as the drug is teratogenic in laboratory animals. Also, as well as turning urine orange, rifampin is excreted in tears, resulting in staining of contact lenses; thus, they should not be used during the course of therapy.

Because systemic antimicrobial therapy of meningococcal disease does not reliably eradicate nasopharyngeal carriage of *N. meningiditis*, it is also important to give chemoprophylaxis to the index patient before discharge from the hospital (*18*).

Nasopharyngeal cultures are not helpful in determining who warrants chemoprophylaxis and unnecessarily delay institution of this preventive measure.

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Epidemiologic Notes and Reports

Reported Measles Cases — United States, Past 4 Weeks

The following states have reported measles during the past 4 weeks: Arizona, California, Colorado, Connecticut, Florida, Georgia, Idaho, Illinois, Kansas, Louisiana, Maryland, Massachusetts, Michigan, Minnesota, Montana, New Jersey, upstate New York, Ohio, Oregon, Pennsylvania, Texas, Virginia, West Virginia, and Wisconsin; New York City has also reported measles.

The *Morbidity and Mortality Weekly Report* is prepared by the Centers for Disease Control, Atlanta, Georgia, and available on a paid subscription basis from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, (202) 783-3238.

The data in this report are provisional, based on weekly reports to CDC by state health departments. The reporting week concludes at close of business on Friday; compiled data on a national basis are officially released to the public on the succeeding Friday.

The editor welcomes accounts of interesting cases, outbreaks, environmental hazards, or other public health problems of current interest to health officials. Such reports and any other matters pertaining to editorial or other textual considerations should be addressed to: ATTN: Editor, *Morbidity and Mortality Weekly Report*, Centers for Disease Control, Atlanta, Georgia 30333.

☆U.S. Government Printing Office: 1985-746-149/10052 Region IV

HHS Publication No. (CDC) 85-8017