

**WHO/UNICEF  
Review of National Immunization Coverage  
1980-2008**

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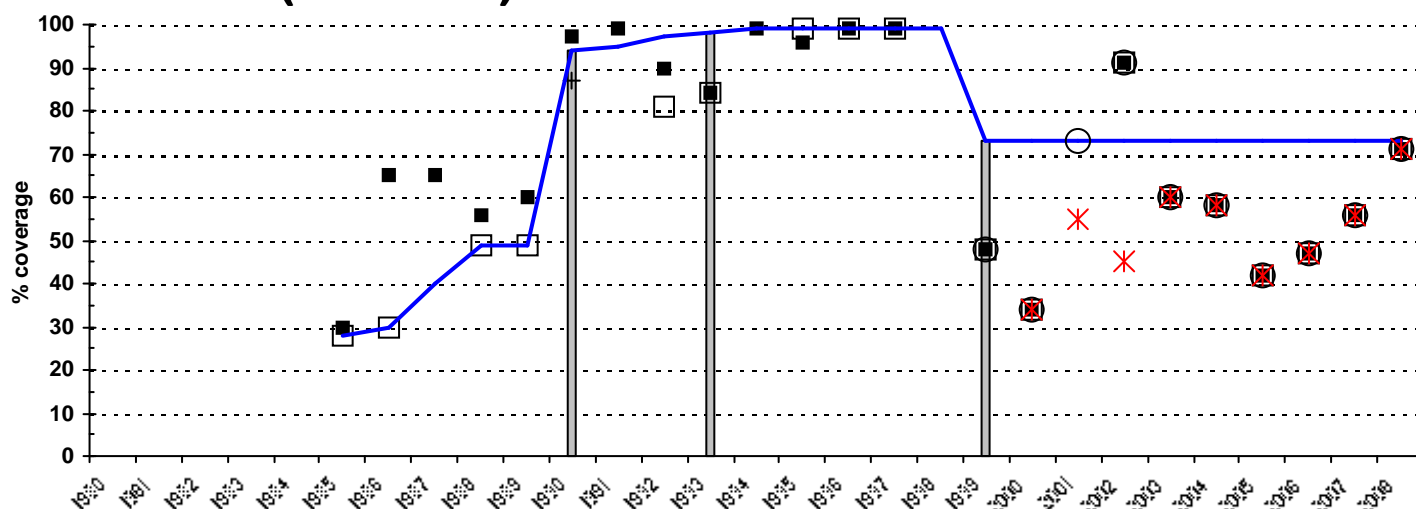
***Equatorial Guinea***

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**July, 2009**

# Equatorial Guinea

## BCG (1980-2008)



### Description of trend

Estimates since 1990 are based on survey results. Since 1999 coverage has dropped dramatically. Contributing factors include: lack of resources to maintain motorcycles and cold chain, insufficient trained staff and limited external financial support. The decline is indicated by the routine monitoring system and the MICS 2000. Estimates from 1999 onwards are based on the MICS 2000 survey. WHO/UNICEF recommend improving routine monitoring systems and conducting surveys to determine levels of coverage.

### Data presented in chart

Year	WHO/ UNICEF estimate (%)  —	Reported to:*		Government official estimate (%)  ○	Reported doses administered (%)**  ✕	Survey data (%)***	
		WHO (%)  □	UNICEF (%)  ■			Survey 12-23 months  	Survey <12 months  +
1980							
1981							
1982							
1983							
1984							
1985	28	28	30				
1986	30	30	65				
1987	40		65				
1988	49	49	56				
1989	49	49	60				
1990	94		97			94	87
1991	95		99				
1992	97	81	90				
1993	98	84	84			98	
1994	99		99				
1995	99	99	96				
1996	99	99	99				
1997	99	99	99				
1998	99						
1999	73	48	48	48		73	
2000	73	34	34	34	34		
2001	73			73	55		
2002	73	91	91	91	45		
2003	73	60	60	60	60		
2004	73	58	58	58	58		
2005	73	42	42	42	42		
2006	73	47	47	47	47		
2007	73	56	56	56	56		
2008	73	71	71	71	71		

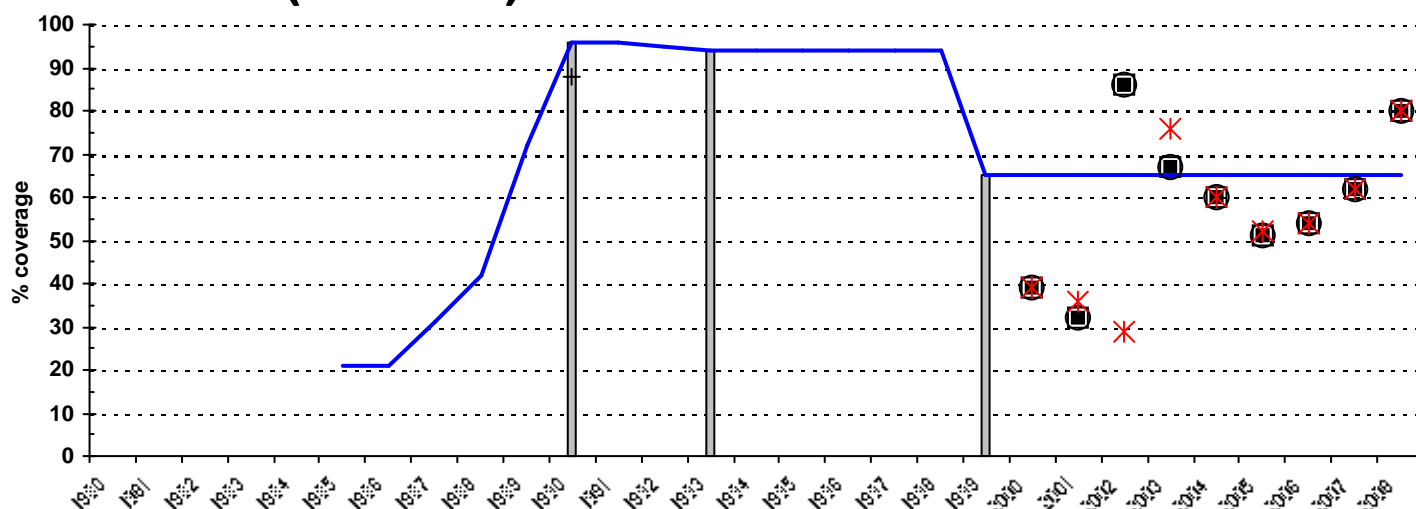
\*Prior to 1998 national reports to WHO/UNICEF did not specify whether information was derived from administrative records, surveys or other sources.

\*\*Coverage based on registration of doses administered by health care providers.

\*\*\*In case more than one survey was implemented in a certain year the highest value is presented. Details of all data are presented in the second section of this report.

# Equatorial Guinea

## DTP1 (1980-2008)



### Description of trend

WHO and UNICEF began requesting data on DTP1 coverage in 2001 and have received national reports reflecting DTP1 coverage from 2001 onward. The estimates are derived from the WHO/UNICEF estimates of DTP3, calibrated to the level of surveys, and the relationship between levels of DTP3 coverage and the drop-out between DTP1 and DTP3. This relationship results from an analysis of 282 surveys conducted in 1 countries which were published between 1980 and 2004. WHO/UNICEF recommend improving routine monitoring systems and conducting surveys to determine levels of coverage.

### Data presented in chart

Year	WHO/ UNICEF estimate (%)	Reported to:*		Government official estimate (%)	Reported doses administered (%)**	Survey data (%)***	
		WHO (%)	UNICEF (%)			Survey 12-23 months	Survey <12 months
1980							
1981							
1982							
1983							
1984							
1985	21						
1986	21						
1987	31						
1988	42						
1989	72						
1990	96					96	88
1991	96						
1992	95						
1993	94					94	
1994	94						
1995	94						
1996	94						
1997	94						
1998	94						
1999	65					65	
2000	65	39	39	39	39		
2001	65	32	32	32	36		
2002	65	86	86	86	29		
2003	65	67	67	67	76		
2004	65	60	60	60	60		
2005	65	51	51	51	52		
2006	65	54	54	54	54		
2007	65	62	62	62	62		
2008	65	80	80	80	80		

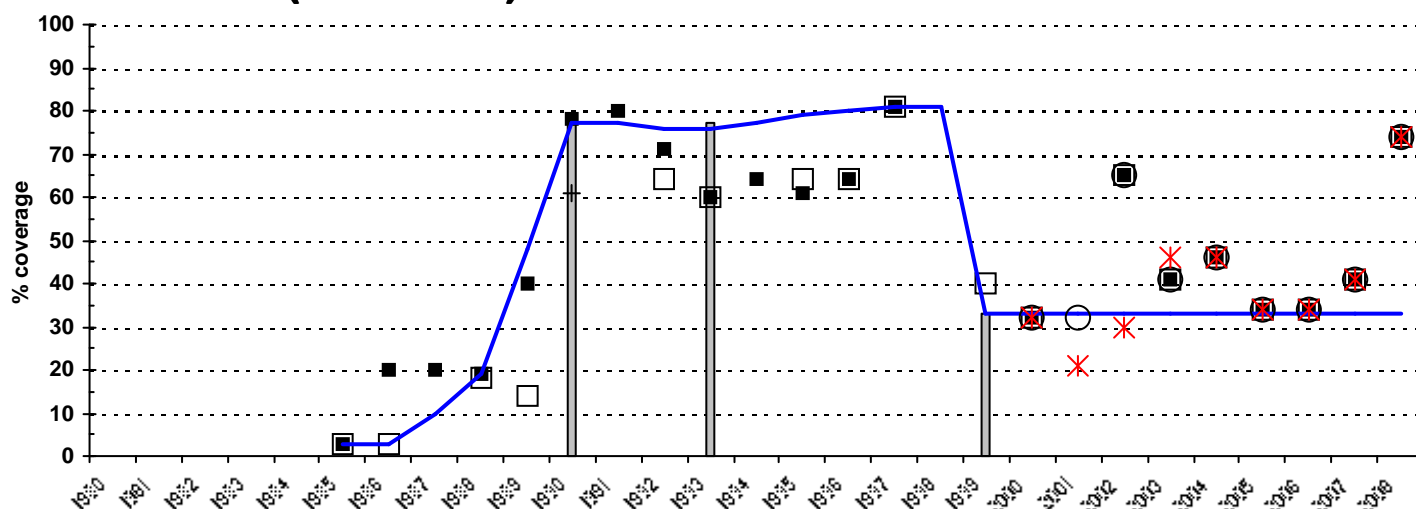
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\*\*\*In case more than one survey was implemented in a certain year the highest value is presented. Details of all data are presented in the second section of this report.

# Equatorial Guinea

## DTP3 (1980-2008)



### Description of trend

Estimates since 1990 are based on survey results. Since 1999 coverage has dropped dramatically. Contributing factors include: lack of resources to maintain motorcycles and cold chain, insufficient trained staff and limited external financial support. The decline is indicated by the routine monitoring system and the MICS 2000. Estimates from 1999 onwards are based on the MICS 2000 survey. WHO/UNICEF recommend improving routine monitoring systems and conducting surveys to determine levels of coverage.

### Data presented in chart

Year	WHO/ UNICEF estimate (%)  —	Reported to:*		Government official estimate (%)  ○	Reported doses administered (%)**  ✕	Survey data (%)***	
		WHO (%)  □	UNICEF (%)  ■			Survey 12-23 months  	Survey <12 months  +
1980							
1981							
1982							
1983							
1984							
1985	3	3	3				
1986	3	3	20				
1987	10		20				
1988	19	18	19				
1989	48	14	40				
1990	77		78			77	61
1991	77		80				
1992	76	64	71				
1993	76	60	60			77	
1994	77		64				
1995	79	64	61				
1996	80	64	64				
1997	81	81	81				
1998	81						
1999	33	40				33	
2000	33	32	32	32	32		
2001	33			32	21		
2002	33	65	65	65	30		
2003	33	41	41	41	46		
2004	33	46	46	46	46		
2005	33	34	34	34	34		
2006	33	34	34	34	34		
2007	33	41	41	41	41		
2008	33	74	74	74	74		

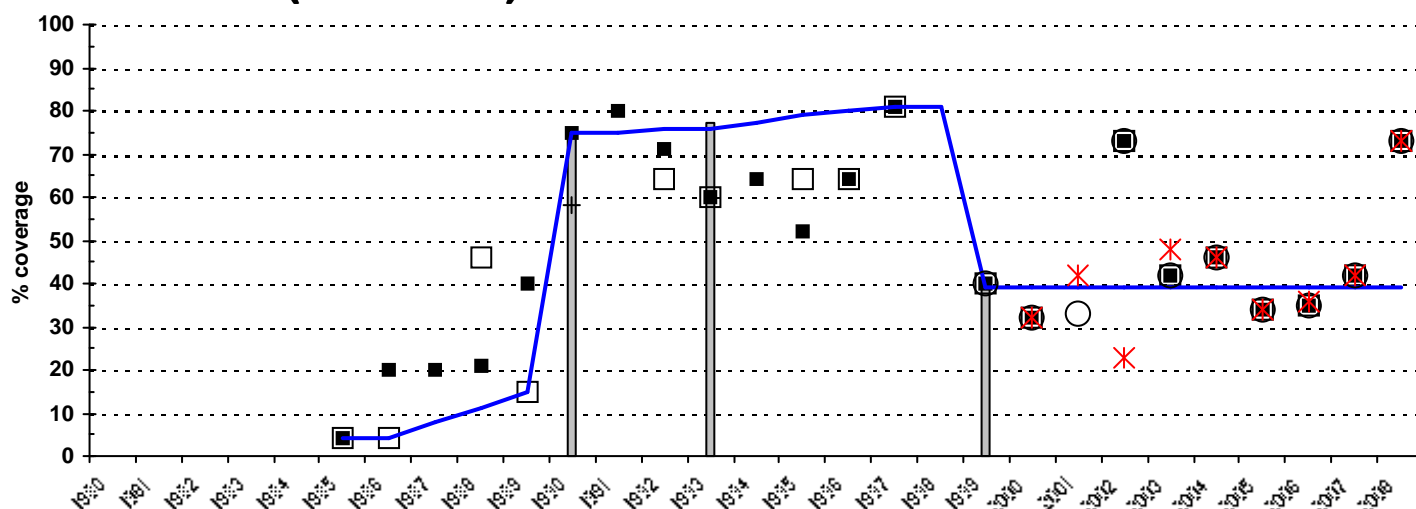
\*Prior to 1998 national reports to WHO/UNICEF did not specify whether information was derived from administrative records, surveys or other sources.

\*\*Coverage based on registration of doses administered by health care providers.

\*\*\*In case more than one survey was implemented in a certain year the highest value is presented. Details of all data are presented in the second section of this report.

# Equatorial Guinea

## Pol3 (1980-2008)



### Description of trend

Estimates since 1990 are based on survey results. Since 1999 coverage has dropped dramatically. Contributing factors include: lack of resources to maintain motorcycles and cold chain, insufficient trained staff and limited external financial support. The decline is indicated by both the routine monitoring system and the MICS 2000. Estimates from 1999 onwards are based on the MICS 2000 survey. WHO/UNICEF recommend improved routine monitoring systems and conducting surveys to determine levels of coverage.

### Data presented in chart

Year	WHO/ UNICEF estimate (%)  —	Reported to:*		Government official estimate (%)  ○	Reported doses administered (%)**  ✕	Survey data (%)***	
		WHO (%)  □	UNICEF (%)  ■			Survey 12-23 months  	Survey <12 months  +
1980							
1981							
1982							
1983							
1984							
1985	4	4	4				
1986	4	4	20				
1987	8		20				
1988	11	46	21				
1989	15	15	40				
1990	75		75			74	58
1991	75		80				
1992	76	64	71				
1993	76	60	60			77	
1994	77		64				
1995	79	64	52				
1996	80	64	64				
1997	81	81	81				
1998	81						
1999	39	40	40	40		39	
2000	39	32	32	32	32		
2001	39			33	42		
2002	39	73	73	73	23		
2003	39	42	42	42	48		
2004	39	46	46	46	46		
2005	39	34	34	34	34		
2006	39	35	35	35	36		
2007	39	42	42	42	42		
2008	39	73	73	73	73		

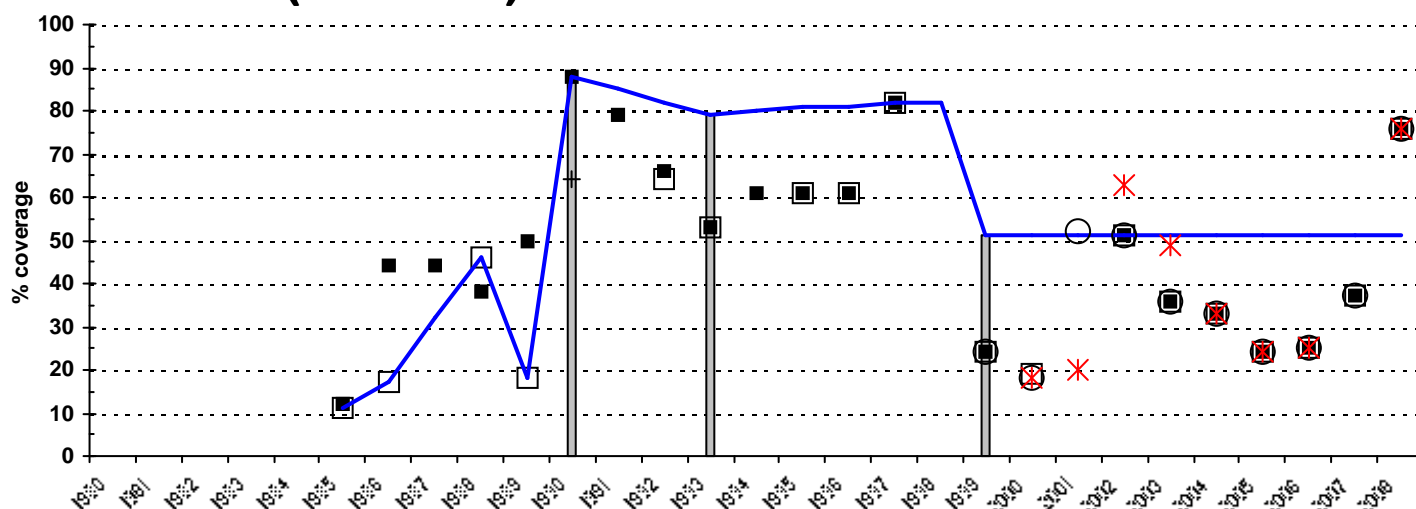
\*Prior to 1998 national reports to WHO/UNICEF did not specify whether information was derived from administrative records, surveys or other sources.

\*\*Coverage based on registration of doses administered by health care providers.

\*\*\*In case more than one survey was implemented in a certain year the highest value is presented. Details of all data are presented in the second section of this report.

# Equatorial Guinea

## MCV (1980-2008)



### Description of trend

Estimates since 1990 are based on survey results. Since 1999 coverage has dropped dramatically. Contributing factors include: lack of resources to maintain motorcycles and cold chain, insufficient trained staff and limited external financial support. The decline is indicated by the routine monitoring system and the MICS 2000. Estimates from 1999 onwards are based on the MICS 2000 survey. WHO/UNICEF recommend improving routine monitoring systems and conducting surveys to determine levels of coverage.

### Data presented in chart

Year	WHO/ UNICEF estimate (%)	Reported to:*		Government official estimate (%)	Reported doses administered (%)**	Survey data (%)***	
		WHO (%)	UNICEF (%)			Survey 12-23 months	Survey <12 months
1980							
1981							
1982							
1983							
1984							
1985	11	11	12				
1986	17	17	44				
1987	32		44				
1988	46	46	38				
1989	18	18	50				
1990	88		88			87	64
1991	85		79				
1992	82	64	66				
1993	79	53	53			79	
1994	80		61				
1995	81	61	61				
1996	81	61	61				
1997	82	82	82				
1998	82						
1999	51	24	24	24		51	
2000	51	19		18	18		
2001	51			52	20		
2002	51	51	51	51	63		
2003	51	36	36	36	49		
2004	51	33	33	33	33		
2005	51	24	24	24	24		
2006	51	25	25	25	25		
2007	51	37	37	37			
2008	51	76	76	76	76		

\*Prior to 1998 national reports to WHO/UNICEF did not specify whether information was derived from administrative records, surveys or other sources.

\*\*Coverage based on registration of doses administered by health care providers.

\*\*\*In case more than one survey was implemented in a certain year the highest value is presented. Details of all data are presented in the second section of this report.

# Equatorial Guinea

## Details Survey Data

### Year Source

Antigen	Confirmation method	% coverage	Compliance with schedule	Age group	Sample size	% cards seen	Survey year	Comments
<b>1999 Equatorial Guinea MICS 2000</b>								
BCG	Card or History	73.2		12-23 m	457	41.8	2000	
DTP1	Card or History	65		12-23 m	457	41.8	2000	
DTP3	Card or History	32.9		12-23 m	457	41.8	2000	
Pol3	Card or History	38.7		12-23 m	457	41.8	2000	
MCV	Card or History	50.8		12-23 m	457	41.8	2000	

### 1993 Rapport sur l'Enquête Nationale de Couverture Vaccinale Réalisée en Juillet 1994 en République de Guinée Equatoriale

BCG	Card or History	98		12-23 m		90.7	1994	Weighted
DTP1	Card or History	94		12-23 m		90.7	1994	Weighted
DTP3	Card or History	77		12-23 m		90.7	1994	Weighted
Pol3	Card or History	77		12-23 m		90.7	1994	Weighted
MCV	Card or History	79		12-23 m		90.7	1994	Weighted
PAB	Card or History	69		Women 15-49		79	1994	Births last year

### 1990 Rapport sur l'Enquête Nationale de Couverture Vaccinale Réalisée en Février 1991 en Guinée Equatoriale

BCG	Card or History	94		12-23 m			1991	Weighted, card or history 12-23 months
BCG	C or H <12 month	87		12-23 m			1991	Weighted, assume card or history < 12 months
DTP1	Card or History	96		12-23 m			1991	Weighted, card or history 12-23 months
DTP1	C or H <12 month	88		12-23 m			1991	Weighted, assume card or history < 12 months
DTP3	Card or History	77		12-23 m			1991	Weighted, card or history 12-23 months
DTP3	C or H <12 month	61		12-23 m			1991	Weighted, assume card or history < 12 months
Pol3	Card or History	74		12-23 m			1991	Weighted, card or history 12-23 months
Pol3	C or H <12 month	58		12-23 m			1991	Weighted, assume card or history < 12 months
MCV	Card or History	87		12-23 m			1991	Weighted, card or history 12-23 months
MCV	C or H <12 month	64		12-23 m			1991	Weighted, assume card or history < 12 months

## **Equatorial Guinea**

### **WHO/UNICEF Estimates of Protection at Birth (PAB) against tetanus**

In countries where tetanus is recommended for girls and women coverage is usually reported as "TT2+", i.e. the proportion of (pregnant) women who have received their second or superior TT dose in a given year. TT2 + coverage, however, can under-represent the actual proportion of births that are protected against tetanus as it does not include women who have previously received protective doses, women who received one dose without documentation of previous doses, and women who received doses in TT (or Td) supplemental immunization activities (SIA). In addition, girls who have received DTP in their childhood and are entering childbearing age, may be protected with TT booster doses.

WHO and UNICEF have developed a model that takes into account the above scenarios, and calculates the proportion of births in a given year that can be considered as having been protected against tetanus - "Protection at Birth".

In this model, annual cohorts of women are followed from infancy through their life. A proportion receive DTP in infancy (estimated based on the WHO-UNICEF estimates of DTP3 coverage). In addition some of these women also receive TT through routine services when they are pregnant and may also receive TT during SIAs. The model also adjusts reported data, taking into account coverage patterns in other years, and/or results available through surveys. The duration of protection is then calculated, based on WHO estimates of the duration of protection by doses ever received. The proportion of births that are protected against tetanus as a result of maternal immunization reflects the tetanus immunization received by the mother throughout her life rather than simply the TT immunizations received during the current pregnancy.

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<sup>1</sup> This model is described in: Griffiths U., Wolfson L., Quddus A., Younus M., Hafiz R.. Incremental cost-effectiveness of supplementary immunization activities to prevent neo-natal tetanus in Pakistan. Bulletin of the World Health Organization 2004; 82:643-651.

## Equatorial Guinea

Year	PAB coverage estimate (%)
1980	
1981	
1982	
1983	
1984	
1985	14
1986	24
1987	34
1988	44
1989	53
1990	58
1991	63
1992	68
1993	66
1994	71
1995	75
1996	77
1997	78
1998	74
1999	68
2000	61
2001	49
2002	46
2003	62
2004	66
2005	59
2006	59
2007	62
2008	69