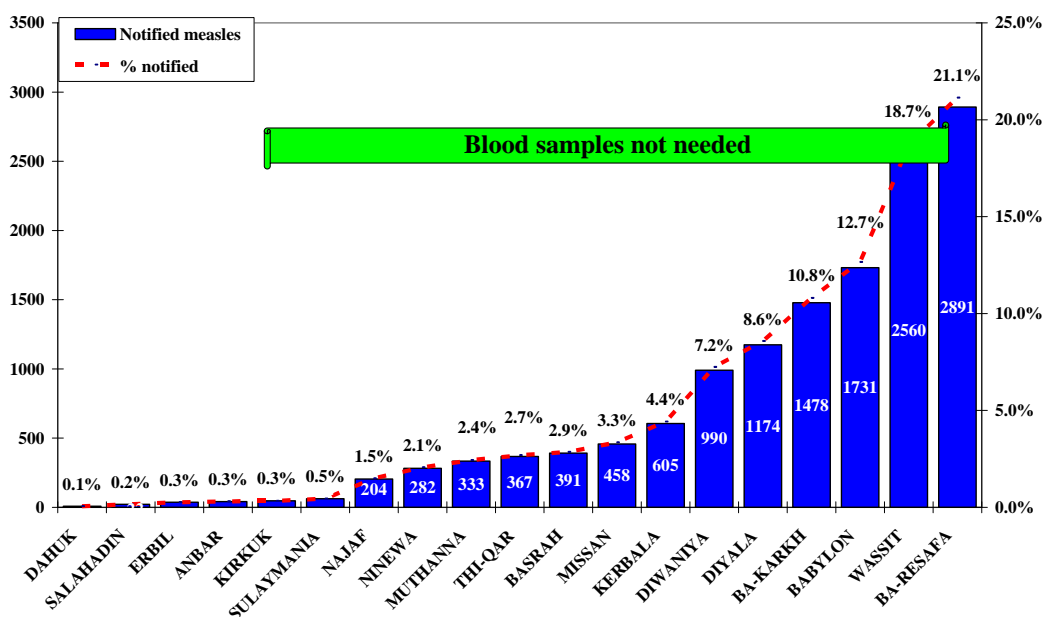


**WHO Representative's Office in Iraq**

**Weekly Feedback on Measles in Iraq  
Report no. 44 International week 12 ending 22/03/2009**

1. **Confirmed Measles cases by province:** during the first 12 weeks of 2009, out of 13679 suspect measles cases reported in Iraq, The 3 northern governorates reported 105 cases (1.0%). The provinces of Anbar, Salahadin, Ninewa and Kirkuk where containment operations were done early in 2008 reported 392 (3%) cases; the majority of cases in the containment group (284 or 72%) were reported from Mosul where only selective SIAs were carried out. The 4 Southern provinces of Basra, Missan, Thi qar and Muthana reported 1549 (11%) of the total cases. The remaining 8 provinces in central Iraq reported the remaining (11633) 85% of cases. It is clear that the outbreak is mainly concentrated in the central part of Iraq and is started to move South and North. The DoH where the outbreak is well established and many cases were confirmed by NML do not require the collecting of blood samples; however, the case investigation should be completed carefully for every case. It is also important to collect serum and other specimens from cases reported in children below 6 months of age.

**Fig (1) Notified Measles by DoH, Iraq, first 12 weeks of 2009**



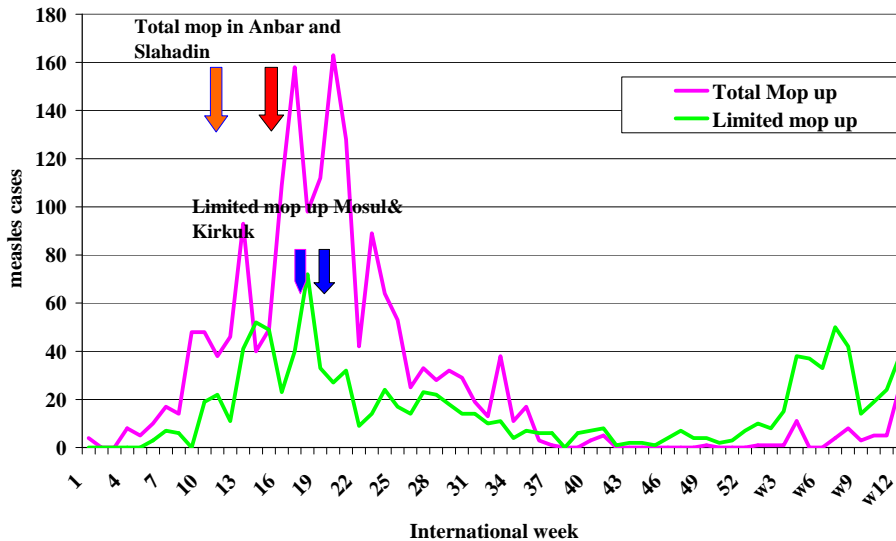
**2. Notified Measles Cases by international week:**

Fig. 2A illustrates notified measles cases in Iraq by week of onset, during 2008 and the first 12 weeks of 2009. In 2008 (8134) measles cases were reported compared to 13679 in the first 12 weeks of 2009. It is clear that the outbreak is gaining momentum. During this year almost 1000 measles cases are reported every week compared to less than 140 cases per week in 2008. It is apparent that the measles outbreak occurred in 3 waves; each wave took about 17 weeks and was concentrated in a group of DoHs, the current outbreak seems to be the biggest and is now at its peak. A fourth and last wave is expected in the upcoming weeks, in the 3 NGs if an emergency campaign is not done.



immunity profile and there is a good epidemiological description of the first few laboratory confirmed cases. It is clear that this huge outbreak (21813 reported cases in 2008 & first 12 weeks of 2009) could have been avoided if a nationwide campaign had been implemented instead of fragmented SIAs

**Fig (2D) Notified measles by total or selective Mop Up, using MCV for 1-5 year old children, according to week of onset, 2008 and first 12 weeks of 2009**



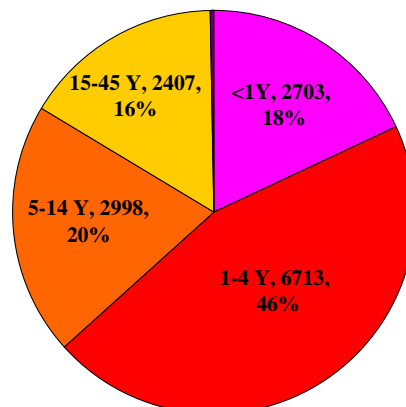
**4. Measles Cases according to the size of Mop Up campaigns.**

Fig. 2D, show that both total and limited Mop Up campaigns succeeded in the control of the measles outbreaks, however, as expected total Mop Up gave better results in terms of number of cases, and more swift and sustained control. Another wave of measles cases is seen in provinces where limited MoP Up was done mainly in Mosul.

**5. Age Distribution:**

Fig 3, shows that 64% of measles cases were reported among children <5years of age, a clear indication of serious problems in routine coverage in the last 4 years. Due to lack of funding WHO could not provide for the requested support to conduct SIAs.

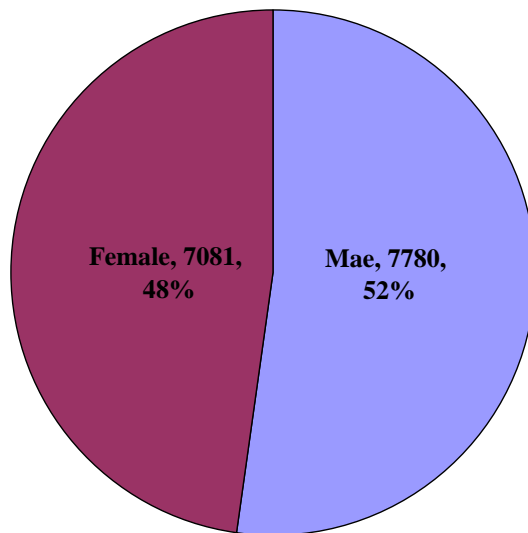
**Fig. 3 Notified Measles Cases by age group, Iraq, first 12 weeks of 2009**



**6. Sex distribution:**

Confirmed measles cases are distributed almost evenly between males and females.

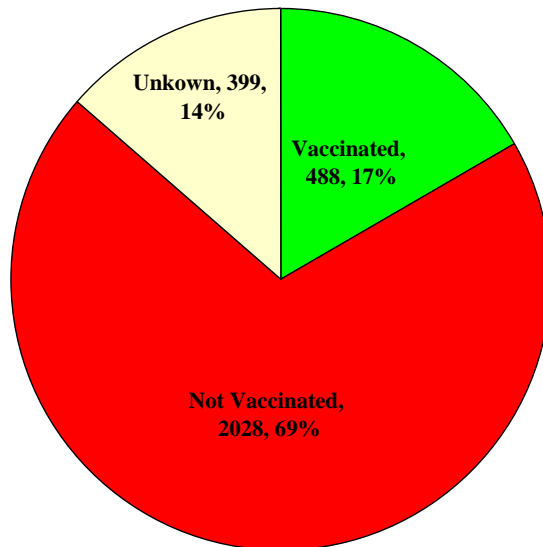
**Fig. 4 Confirmed measles by sex, Iraq 2008 & first 12 weeks of 2009**



**7. Immunization status of notified Measles Cases in Iraq:**

19% immunized, 66% not immunized and 15% unknown vaccination status.

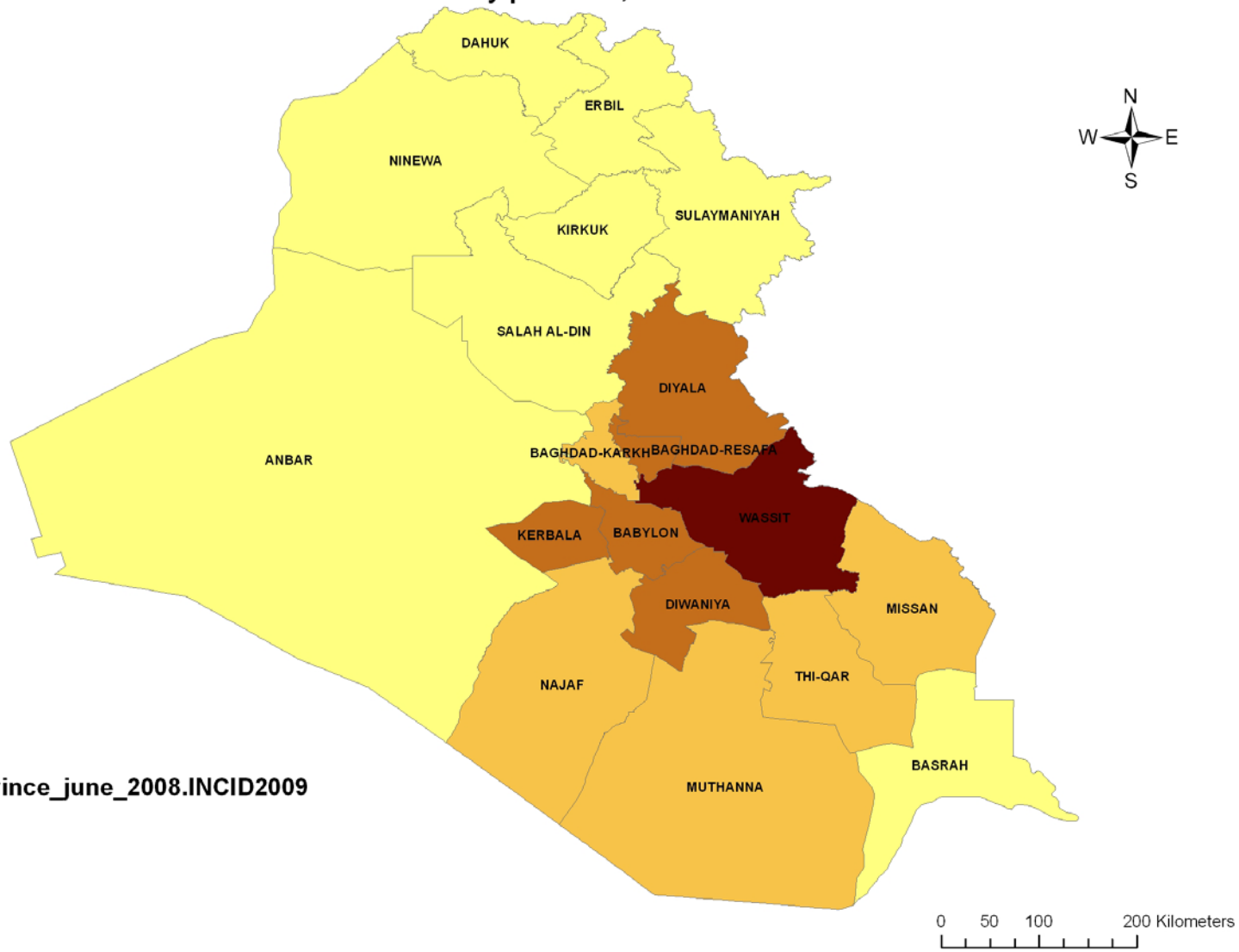
**Fig. 5 confirmed measles cases among children 1-5 years of age by vaccination status, Iraq, 2008**



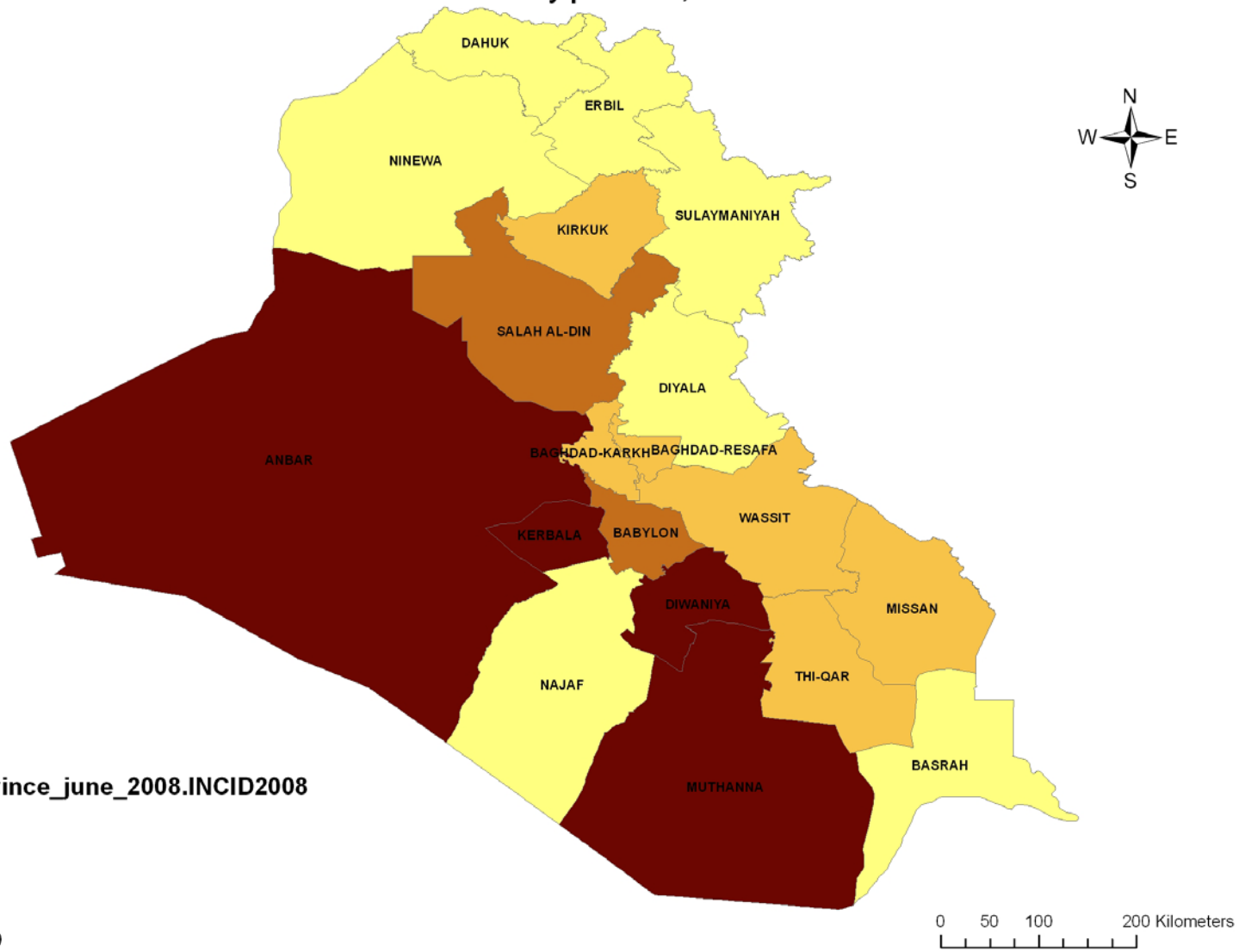
Measles Bulletin, WHO Iraq, Cumulative Measles results for 2008 and the first 12 weeks of 2009

Province	Total pop	No. of cases				Incidence per million population	
		First 11 Ws 09	2008	total	% of cases	first 11 Ws 09	2008
DAHUK	942268	7	28	29	0%	7	30
SALAHADIN	1254303	22	637	637	6%	18	508
ERBIL	1482958	36	7	21	0%	24	5
ANBAR	1483280	42	1056	1070	10%	28	712
SULAYMANIA	1547072	62	30	44	0%	40	19
KIRKUK	1027800	46	344	350	3%	45	335
NINEWA	2864705	282	364	466	4%	98	127
BASRAH	2426607	391	113	191	2%	161	47
NAJAF	1206264	204	68	141	1%	169	56
THI-QAR	1640193	367	482	577	5%	224	294
BA-KARKH	2937300	1478	789	1064	9%	503	269
MISSAN	834977	458	173	256	2%	549	207
MUTHANNA	583511	333	402	518	5%	571	689
KERBALA	930509	605	711	902	8%	650	764
DIYALA	1486547	1174	80	197	2%	790	54
BA-RESAFA	3650383	2891	663	1138	10%	792	182
DIWANIYA	1025253	990	1076	1408	13%	966	1049
BABYLON	1625434	1731	843	1246	11%	1065	519
WASSIT	995296	2560	268	978	9%	2572	269
<b>Iraq</b>	<b>29944660</b>	<b>13679</b>	<b>8134</b>	<b>11233</b>	<b>100%</b>	457	272

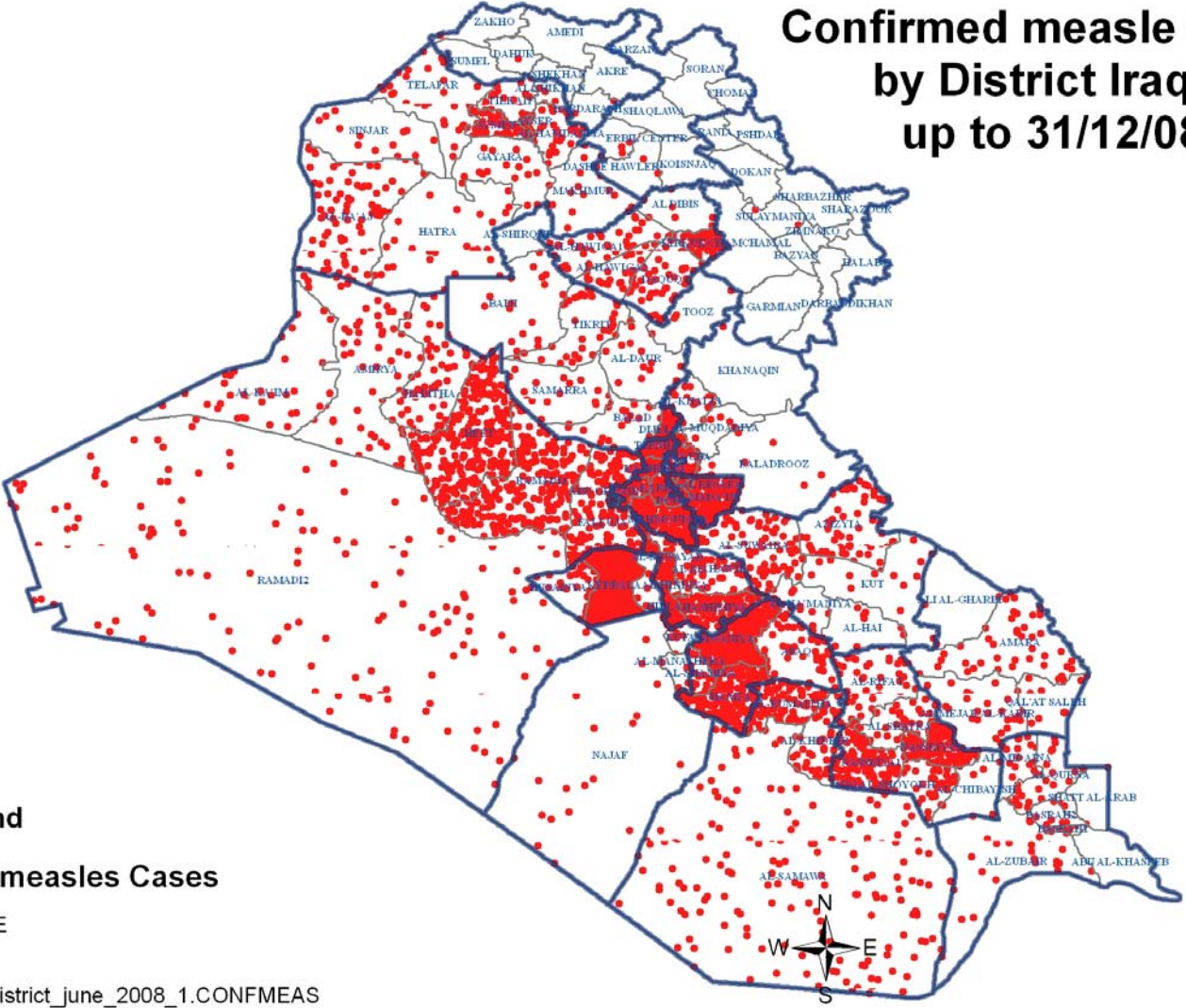
### Measles incidence by province, first 9 Ws 2009



### Measles incidence by province, 2008



# Confirmed measles Cases by District Iraq - up to 31/12/08



### Legend

- Confirmed measles Cases
- PROVINCE
- 1 Dot = 1
- measles\_district\_june\_2008\_1.CONFMEAS