



NATIONAL OBSTETRIC INFORMATION SYSTEM (NOIS)

MALTA

Second Quarterly Report: April to June 2009

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www.sahha.gov.mt/pages.aspx?page=92

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NATIONAL OBSTETRIC INFORMATION SYSTEMS (NOIS)

Background

A national obstetric information system was launched at the Department of Health Information and Research (DHIR) at the beginning of 1999 and now covers practically all deliveries taking place on the islands of Malta and Gozo.

Systematic data collection for NOIS commences once the mother delivers her baby. Information regarding the course and outcome of each pregnancy is recorded by the relevant staff at each centre on a standard NOIS sheet. Once the data are recorded, the sheets are forwarded to the DHIR on a regular basis. At the DHIR the relevant sheets are processed and entered into the NOIS database. All data is kept in accordance with the Data Protection Act, 2001.

The maternity centres actively participating in this information system are: Mater Dei Hospital, Gozo General Hospital, St James Hospital Sliema and Zabbar and St. Philip's Hospital.

Report analysis

This report analyses the national maternities/deliveries and infant births that occurred in the second quarter of 2008 and where appropriate compares it to the figures reported for the same period of last year. The data in this report describes the birth statistics for all maternities (Maltese and non-Maltese) and infant births registered into the system. All births, live or still, of gestation 22 weeks and above are registered and analysed in this report.

Data is sent to the Registry from all hospitals on the Maltese Islands. Accuracy and completeness of data sent on the NOIS reporting sheets is the responsibility of the Hospital providing data.

This report provides basic statistics regarding births and deliveries in the Maltese Islands. If required, further information and details may be obtained from our website: www.sahha.gov.mt/pages.aspx?page=92 or by e-mail: healthinfo@gov.mt.

ANALYSIS

There were a total of 943 maternities/deliveries registered in the Maltese Islands for the second quarter of 2009, which resulted in a total of 961 infant births.

Comparing these figures with those reported for the same period last year one can see that the number of infant births decreased by 8 births (969 births reported in 2nd quarter 2008).

MATERNITIES / DELIVERIES

MATERNAL AGE, MARITAL STATUS, NATIONALITY AND PARITY

Maternal Age:

The maternities have been grouped according to standard age groupings and the frequency distribution of deliveries according to maternal age at delivery has been analysed. In the second quarter of 2009, the greatest number of deliveries (32.6%), occurred in the age group 25 to 29 years, closely followed by the 30-34 year age group. There were <1% deliveries in the age group <15 years and no deliveries in the 45+ age group. The minimum age of mothers at delivery was 14 years while the maximum age was 44 years. The most frequent age at delivery was 29 years and the average age at delivery was also 29 years.

The frequency distribution of deliveries according to maternal age group is given in the following table.

Table 1- Deliveries according to maternal age group

Age in years	2 nd Quarter 2009		2 nd Quarter 2008	
	Frequency	%	Frequency	%
<15	2	0.2	3	0.3
15-19	63	6.7	59	6.2
20-24	139	14.7	126	13.2
25-29	307	32.6	341	35.8
30-34	304	32.2	311	32.6
35-39	111	11.8	89	9.3
40-44	17	1.8	22	2.3
45+	0	0	1	0.1
Unspecified	0	0	1	0.1

Marital Status:

For the second quarter of 2009, 24.0% (226) of all deliveries occurred to mothers who were reported as single (never married); while 72.3% (682) of all deliveries occurred to mothers reported as married, and 3.7% (35) of mothers were reported as widowed, separated or divorced. Marital status was specified for all deliveries.

In the second quarter of 2009, all mothers were registered as having 'Support at home to raise the infant'.

Nationality:

90.7% (855) of all deliveries this quarter, occurred to women of Maltese nationality while 8.8% (83) were Non-Maltese. In the remaining 0.5% (5) nationality was not specified.

Parity:

There were 53.2% (502) of mothers who were primiparas (ie. delivering for the first time) while 46.8% (441) were multiparas (ie. having already delivered at least one child) in the second quarter of 2009.

MATERNAL LIFESTYLES

There were 68 (7.2%) mothers who were reported to smoke one or more cigarettes during pregnancy in the second quarter of this year. None were reported to drink excessive alcohol and 4 were reported to be drug abusers.

The following table gives the smoking, alcohol and drug habits of mothers for the second quarters of 2009 and 2008.

Table 2 – Maternal lifestyles

	<i>2nd Quarter 2009</i>		<i>2nd Quarter 2008</i>	
	<i>No.</i>		<i>No.</i>	
<i>Cigarette smoking during pregnancy</i>				
1 to 3/day	23		23	
> than 3/day	45		38	
Do not smoke	871		879	
Unspecified	4		13	
<i>Alcohol consumption during pregnancy</i>				
Up to 1unit/day	0		0	
> than 1unit/day	0		0	
None	939		940	
Unspecified	4		13	
<i>Drug Abuse during pregnancy</i>				
Yes	4		4	
No	935		935	
Unspecified	4		14	

SPECIAL CONDITIONS OF PREGNANCY

In the second quarter of 2009, there were 4 cases of assisted reproduction (ART) reported, this includes all forms of ART namely ovulation stimulation, IVF and ICSI (11 cases of ART reported in 2nd quarter 2008).

The table below gives the number and frequency of mothers recorded with specific obstetric conditions during pregnancy. The most frequently recorded was gestational hypertension; in fact 8.9% of mothers were registered as having gestational hypertension in the second quarter of 2009.

Table 3 – Pregnancy related conditions

	<i>2nd Quarter 2009</i>		<i>2nd Quarter 2008</i>	
	<i>Frequency</i>	<i>%</i>	<i>Frequency</i>	<i>%</i>
Antepartum Haemorrhage	15	1.6	39	4.1
Gestational hypertension	84	8.9	57	6.0
Pre-eclampsia	21	2.2	23	2.4
Eclampsia	1	0.1	1	0.1
Placenta praevia	17	1.8	21	2.2
Abruption of placenta	5	0.5	2	0.2

Diabetes in Pregnancy

In the second quarter of this year, there were 8 mothers who were reported as being Insulin Dependent Diabetic before the current pregnancy while one mother was reported with Non-Insulin Dependent diabetes prior to pregnancy. In addition, there were a total of 46 mothers registered with gestational diabetes who were controlled without the use of insulin, and no mothers registered as having gestational diabetes treated with insulin.

DELIVERIES ACCORDING TO PLURALITY

For the second quarter of 2009, there were a total of 926 (98.2%) singleton, 16 (1.7%) twin and 1 triplet delivery.

Table 4 –Delivery by Plurality

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
Singleton	926	938
Twin	16	14
Triplet	1	1
Quadruplet	0	0

INFANT BIRTHS

TOTAL INFANT BIRTHS AND GENDER DISTRIBUTION

In the second quarter of this year, there were a total of 961 infant births.

There were more male infants born than female, the gender distribution for this quarter was 498 (51.8%) males and 463 (48.2%) females (*2nd quarter 2008: males –501; females – 467*).

INFANTS AND METHOD OF BIRTH

Of the 961 infants born, 621 (64.6%) were delivered as unassisted vertex delivery, 289 (30.1%) by emergency or elective Caesarean Section and 51 (5.3%) by assisted vaginal delivery (this includes forceps, ventouse and breech deliveries).

Table 5 – Distribution of births by method of delivery

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
Vaginal vertex delivery	621	590
Emergency/elective Caesarean Section	289	337
Forceps delivery	4	3
Ventouse	47	38
Breech	0	1

**Data analysed according to total infant births*

This quarter there were 289 babies born by caesarian section but 272 caesarean deliveries performed, this due to the fact that a number of caesareans are done in multiple birth deliveries. The Caesarean section operation rate was 28.8% of the total maternal deliveries (943) this quarter.

BIRTHS BY GESTATIONAL AGE CATEGORY

This quarter there were 74 (7.7%) preterm babies of less than 37 weeks gestation. 14 (1.5%) were very preterm being less than 32 weeks of gestation.

Table 6 – Distribution by gestational age categories

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
Extremely Preterm (22 - 27 wks)	2	10
Very Preterm (28 - 31 wks)	12	7
Moderately Preterm (32 - 36wks)	60	61
Term (37 - 41wks)	884	891
Post term (41+ wks)	3	0
Unknown	0	0

INFANT BIRTH WEIGHTS

In the second quarter of 2009, there were 886 (92.2%) of the total births that occurred in the birth weight range of 2500g to 4999g, 65 (6.8%) of the total births were in the low birth weight range of 1500g to 2499g, 7 (1%) of births were of very low birth weight 500g to 1499g and 1 was less than 500g although having a gestation of 22 completed weeks. In 1 case the birth weight was unspecified. There was one infant with birth weight over 5000g.

Table 7 – Births by birth weight

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
<500g	1	1
500-999g	3	8
1000-1499g	4	5
1500-1999g	11	16
2000-2499g	54	45
2500-2999g	201	199
3000-3499g	415	406
3500-3999g	228	216
4000-4499g	37	62
4500-4999g	5	3
5000+	1	0
Unspecified	1	8
Average Birth weight (g)	3208	3216

OUTCOME OF BIRTH

The number of live births for the second quarter of this year was 958 which accounted for 99.7% of the total births at a national level. The remaining 3 births were stillbirths. Stillbirths are defined as fetal death at or after 22 completed weeks of gestation.

Table 8 – Live and still births

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
Babies born alive	958	964
Stillbirths	3	5

Of the 958 live births this quarter, there were 5 early neonatal deaths and no late neonatal deaths.

Table 9 – Early and late neonatal deaths

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
Early Neonatal deaths	5	5
Late Neonatal deaths	0	1

INFANT FEEDING METHODS AT DISCHARGE

Infant feeding habits are recorded by hospital staff at the time of discharge, little can be said on the actual infant feeding habits as these may change soon after discharge from the birthing facilities.

Table 10 – Infant feeding methods at time of discharge

	<i>2nd Quarter 2009</i>	<i>2nd Quarter 2008</i>
Breast only	601	527
Bottle only	256	328
Mixed (Breast & Bottle)	96	97
Other*	8	16
Unspecified	0	1

* 'Other' - include babies who are still at hospital after 28 days and those who die before discharge

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St. Philip's Hospital, Sta Venera.