

Council on Human Reproductive Technology 2022 Annual Statistics

published in July 2024*

* Statistics on live birth events in relation to reproductive procedures performed in 2022 are covered in this final version.

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Introduction

The Council on Human Reproductive Technology was established under section 4 of the Human Reproductive Technology Ordinance (Cap. 561) (“the Ordinance”) in April 2001 to regulate the provision of reproductive technology (RT) procedures, the conducting of embryo research, the handling, storing or disposing of gametes or embryos used or intended to be used in connection with a RT procedure or embryo research, and surrogacy arrangement.

According to section 5(1) of the Ordinance, the Council shall keep under review information about RT activities and publish statistics and summaries concerning relevant activities which have been carried on. To this end, the *Annual Statistics* has been published since 2009.

This 2022 *Annual Statistics* lists out different RT activities carried out by the licensed centres in operation in the year. It provides graphs, charts and tables that summarize information about the RT activities and its outcomes in 2022. The figures in this publication are based only on RT cycles performed in 2022 and cannot be used to calculate cumulative success rates.

As at 31.12.2022, there were a total of 40 valid licences issued by the Council, including 21 Artificial Insemination by Husband (AIH) licences, 15 Treatment licences, 3 Research licences and 1 Storage licence. This publication provides information on the reported outcomes of all RT cycles started in the licensed AIH and treatment centres.

RT cycles include any process in which (1) a RT procedure is performed or (2) frozen embryos have been thawed with the intent of transferring them to a woman. For example, an RT cycle could include an embryo transfer. Another cycle could include egg retrieval and storage of embryos.

Of the 8,941 non-donor in vitro fertilization (IVF) and frozen-thawed embryo transfer (FET) cycles reported in 2022, a total of 5,510 (61.6%) were started with the intent to transfer at least one embryo. These 5,510 cycles resulted in 1,964 pregnancies, 1,681 live-birth events (delivery of one or more living babies), and 1,787 babies. The other 3,431 cycles (38.4%) were banking cycles, where eggs or embryos were cryopreserved (frozen) and stored for potential future use.

A patient’s chances of having a pregnancy and live-birth delivery when using RT are influenced by many factors. Some of these factors are patient-related, such as the patient’s age or the cause of infertility. This *Annual Statistics* includes the figures on infertility diagnosis of patients for the reference of readers.

The *Annual Statistics* also includes information on live birth event rate, which can give potential RT users an idea of the average chances of success. However, the average live birth event rate in the *Annual Statistics* should be viewed as a general reference only and couples should discuss with their doctor about their treatment plan and potential for success under their specific circumstances.

The figures in this report provide data on pregnancy and live birth event outcomes and trends of the types of procedures performed and pregnancy outcomes. The figures also include RT cycles that used fresh or frozen oocytes (for non-donor IVF cycles only).

Key Terms used in the Annual Statistics

Terms	Description
Artificial insemination by husband (AIH)	The placing of sperm inside a woman's vagina or uterus (i.e. womb) by means other than sexual intercourse. In artificial insemination by husband (AIH), the husband's sperm is used.
Clinical pregnancy	A pregnancy documented by one or more gestational sacs on ultrasound or the histological confirmation of gestational products in miscarriages or ectopic pregnancies.
Clinical pregnancy rate	Clinical pregnancy rate is expressed as number of clinical pregnancies per 100 treatment cycles started/commenced or per 100 cycles reaching the stage of attempted oocyte recovery/retrieval or embryo transfer (ET).
Donor insemination (DI)	Also known as artificial insemination by donor (AID). DI is an artificial insemination whereby sperm collected from a man who is not the woman's husband is used.
Ectopic pregnancy	A pregnancy in which implantation has taken place outside the uterine cavity.
Heterotopic pregnancy	Simultaneous existence of intrauterine and ectopic pregnancy.
In vitro fertilisation (IVF)	In vitro fertilization (a) means the fertilization of an egg by sperm outside the human body, whether or not the egg was originally removed from the body of that or any other woman; (b) includes any procedure involving the induction or aspiration of an egg, or the culture of an egg for the purposes of any such fertilization. It includes IVF without ICSI and IVF with ICSI.
Intracytoplasmic sperm injection (ICSI)	A method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
Live birth event	For the purposes of the Code of Practice on Reproductive Technology and Embryo Research issued by the Council, live birth event shall mean an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
Live birth event rate	Unless otherwise specified, live birth event (single and multiple live births included) rate is expressed per 100 treatment cycles started, i.e. live birth event rate = Number of live birth events/Number of treatment cycles x 100%

Terms	Description
Microsurgical epididymal sperm aspiration/extraction (MESA/MESE)	A surgical procedure performed with the assistance of an operating microscope to retrieve sperm from the epididymis of men with obstructive azoospermia. In the absence of optical magnification, any surgical procedure to retrieve sperm from the epididymis should also be registered as MESE.
Miscarriage (Spontaneous abortion)	A loss of an intrauterine pregnancy detected clinically or by ultrasound, and less than 24 weeks' gestation (as estimated by the day of embryo transfer or day of ovulation).
Multiple live birth event rate	Unless otherwise specified, multiple live birth event rate is expressed per 100 treatment cycles started, i.e. Multiple live birth event rate = Number of multiple live birth events/Number of treatment cycles x 100%
No. of no pregnancy	The number of treatment cycles started and reported by the licensed centre with an outcome of "no pregnancy", including those abandoned and those ending with elective cryopreservation of embryos.
Ongoing pregnancy	Ongoing pregnancy with foetal cardiac activity during the period of the year being reported on.
Ongoing pregnancy rate	Ongoing pregnancy rate is expressed as number of ongoing pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer.
Testicular sperm aspiration/extraction (TESA/TESE)	A surgical procedure involving one or more testicular biopsies or needle aspirations to obtain sperm for use in IVF and/or ICSI.
Treatment cycle	<p>The process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.</p> <p>This annual statistics only covered treatment cycles that led to (1) Gamete transfer/embryo replacement/insemination, or stopped because of (2) Elective cryopreservation of all embryos or (3) Cycle abandonment.</p>

Key Statistics and Charts

Key Statistics for 2022

A (for non-donor IVF cycles only)

1 Type of RT procedures (%)		2 Patient diagnosis ³ (%)					
(Please refer to Chart A1)		(Please refer to Chart A2)					
IVF ¹ (with ICSI) ²	37.89	Single cause				Multiple causes	
		Endometriosis	2.5	Male factor	22.2	Tubal problem	3.0
		Immunologic problem	0.2	Ovulatory problem	2.8	Other Causes	14.8
IVF (without ICSI)	8.79	Tubo-peritoneal problem				Unexplained	11.8
Frozen-thawed ET	53.32					Female & male factors	33.4
						Female factors only:	6.4

Pregnancy & Live Birth Outcomes		Age Group ⁴							
		25 or below	26-30	31-35	36-40	41-45	46-50	51 or above	All/ Overall%
3	Fresh embryos from patient couple's own gametes								
a	Number of patients	9	152	1038	1602	556	46	1	3404
b	Number of treatment cycles ⁵	9	164	1134	1916	856	90	5	4174
c	Number of treatment cycles with embryo transferred	1	22	175	399	169	14	3	783
d	Average number of embryo transferred	1.00	1.09	1.15	1.25	1.63	1.86	1.67	1.32
e	Clinical pregnancy rate ⁶ (%)	11.1	6.7	5.6	6.8	4.6	3.3	0.0	5.9
f	Live birth event rate ⁷ (%)	11.1	6.1	3.9	4.1	1.8	0.0	0.0	3.6
g	Singleton live birth event rate ⁸ (%)	11.1	5.5	3.6	3.8	1.8	0.0	0.0	3.3
h	Multiple live birth event rate ⁹ (%)	0.0	0.6	0.3	0.3	0.0	0.0	0.0	0.2
4	Frozen embryos from patient couple's own gametes								
a	Number of patients	10	154	1133	1756	515	38	1	3607
b	Number of treatment cycles ⁵	13	200	1492	2342	664	55	1	4767
c	Number of treatment cycles with embryo transferred	13	197	1483	2322	658	53	1	4727
d	Average number of embryo transferred	1.15	1.15	1.17	1.23	1.36	1.58	2.00	1.23
e	Clinical pregnancy rate ⁶ (%)	46.2	56.5	51.5	44.1	30.6	10.9	0.0	44.7
f	Live birth event rate ⁷ (%)	38.5	47.0	40.3	30.2	18.4	1.8	0.0	32.1
g	Singleton live birth event rate ⁸ (%)	30.8	44.0	37.6	28.2	18.2	1.8	0.0	30.1
h	Multiple live birth event rate ⁹ (%)	7.7	3.0	2.7	2.0	0.2	0.0	0.0	2.0
5	Trends of RT Procedures								
a	Number of patients and treatment cycles					Please refer to Chart A5(a)			
b	Proportion of ICSI cycles (%)					Please refer to Chart A5(b)			
c	Number of live birth events and babies born					Please refer to Chart A5(c)			
d	Live birth event rate (%)					Please refer to Chart A5(d)			
e	Percentage of treatment cycles (with embryo transferred) resulting in live birth events by one, two and three embryos transferred (%)					Please refer to Chart A5(e)			

B

1 Storage of Gametes and Embryos	
a	Number of gametes and embryos stored by licensed centres
b	Number of gametes or embryos stored or used for research

Remarks:

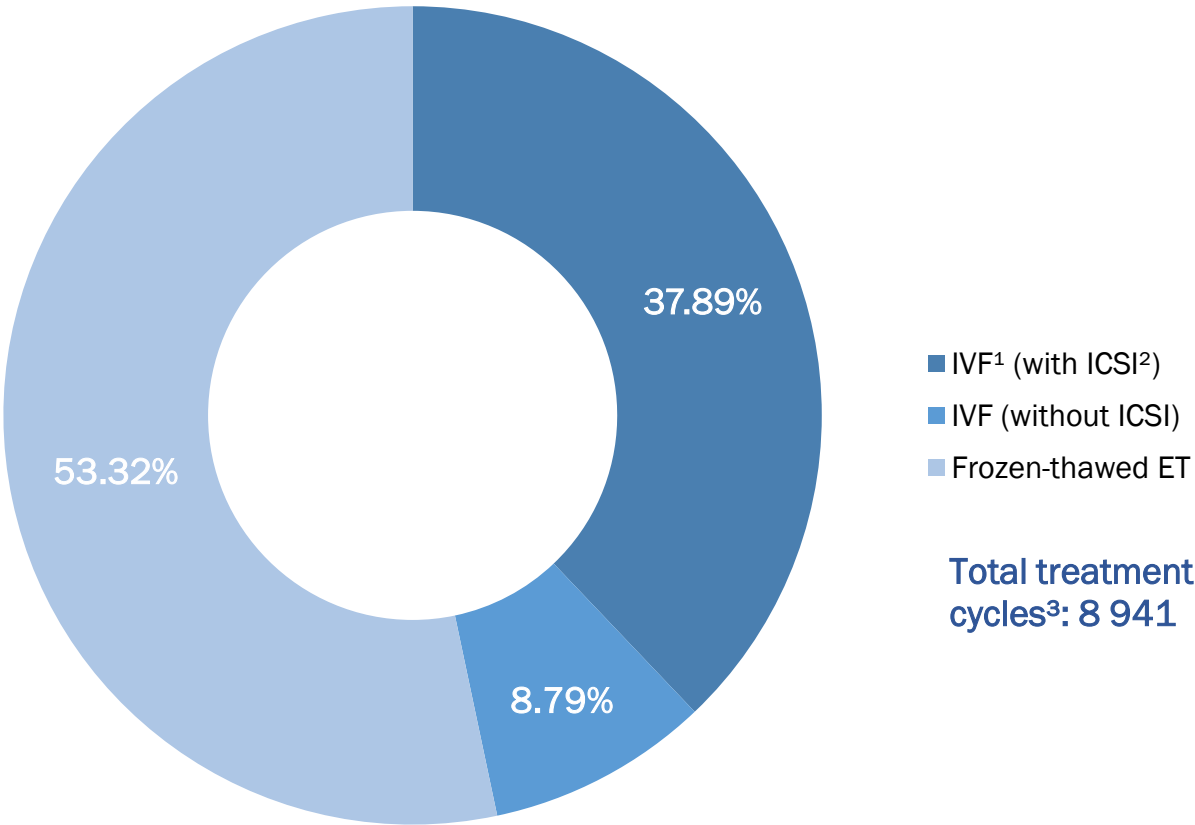
NA Not applicable

- (1) **In vitro fertilization (IVF)** (a) means the fertilization of an egg by sperm outside the human body, whether or not the egg was originally removed from the body of that or any other woman; (b) includes any procedure involving the induction or aspiration of an egg, or the culture of an egg for the purposes of any such fertilization.
It includes Conventional IVF (IVF without ICSI) and IVF with ICSI.

- (2) **Intracytoplasmic sperm injection (ICSI)** means a method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
- (3) Total patient diagnosis percentages may be greater than 100% because more than one diagnosis can be reported for each treatment cycle.
- (4) The age of wife has been used in calculating the age of patient.
- (5) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.
- This annual statistics only covered treatment cycles that led to (1) Gamete transfer/embryo replacement/insemination, or stopped because of (2) Elective cryopreservation of all embryos or (3) Cycle abandonment.
- (ii) In this Key Statistics, the treatment cycles for (a) RT procedures involving donated gametes/embryos and (b) involving artificial insemination (i.e. AIH and DI) are excluded in the above table and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded in the above table.
- (6) (i) **Clinical pregnancy** means a pregnancy documented by one or more gestational sacs on ultrasound or the histological confirmation of gestational products in miscarriages or ectopic pregnancies.
- (ii) **Clinical pregnancy rate** is expressed as number of clinical pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer. i.e. Clinical pregnancy rate = Number of clinical pregnancies/Number of treatment cycles x 100%
- (7) (i) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
- (ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. Live birth event rate [3(f) or 4(f)] = Number of live birth events/Number of treatment cycles [3(b) or 4(b)] x 100%
- (8) (i) **Singleton live birth event** means an event of the birth in Hong Kong of one live child from one single pregnancy.
- (ii) **Singleton live birth event rate** is expressed per 100 treatment cycles started, i.e. Singleton live birth event rate[3(g) or 4(g)] = Number of live birth events with one live child born/Number of treatment cycles [3(b) or 4(b)] x 100%
- (9) (i) **Multiple live birth event** means an event of the birth in Hong Kong of more than one live child from one single pregnancy.
- (ii) **Multiple live birth event rate** is expressed per 100 treatment cycles started, i.e. Multiple live birth event rate[3(h) or 4(h)] = Number of live birth events with more than one live child born/Number of treatment cycles [3(b) or 4(b)] x 100%

Charts for selected Key Statistics

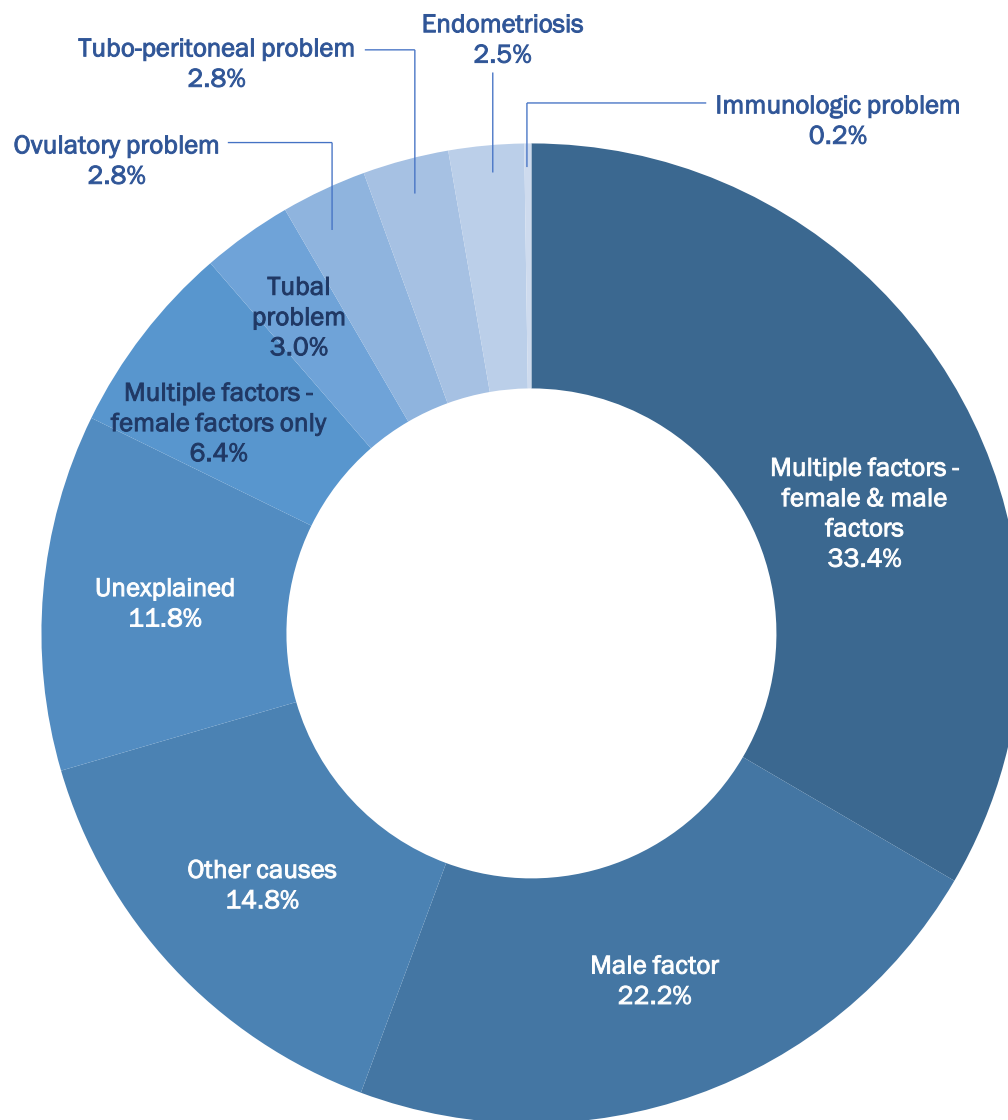
Chart A1 - Type of RT Procedures taken by Patients (%)
(for non-donor IVF cycles only)



Remarks:

- (1) **In vitro fertilization (IVF)** (a) means the fertilization of an egg by sperm outside the human body, whether or not the egg was originally removed from the body of that or any other woman; (b) includes any procedure involving the induction or aspiration of an egg, or the culture of an egg for the purposes of any such fertilization. It includes **IVF without ICSI** and **IVF with ICSI**.
- (2) **Intracytoplasmic sperm injection (ICSI)** means a method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
- (3) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.
- (ii) In this chart, the treatment cycles for (a) RT procedures involving donated gametes/embryos and (b) involving artificial insemination (i.e. AIH and DI) are excluded in the above chart and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded in the above chart.

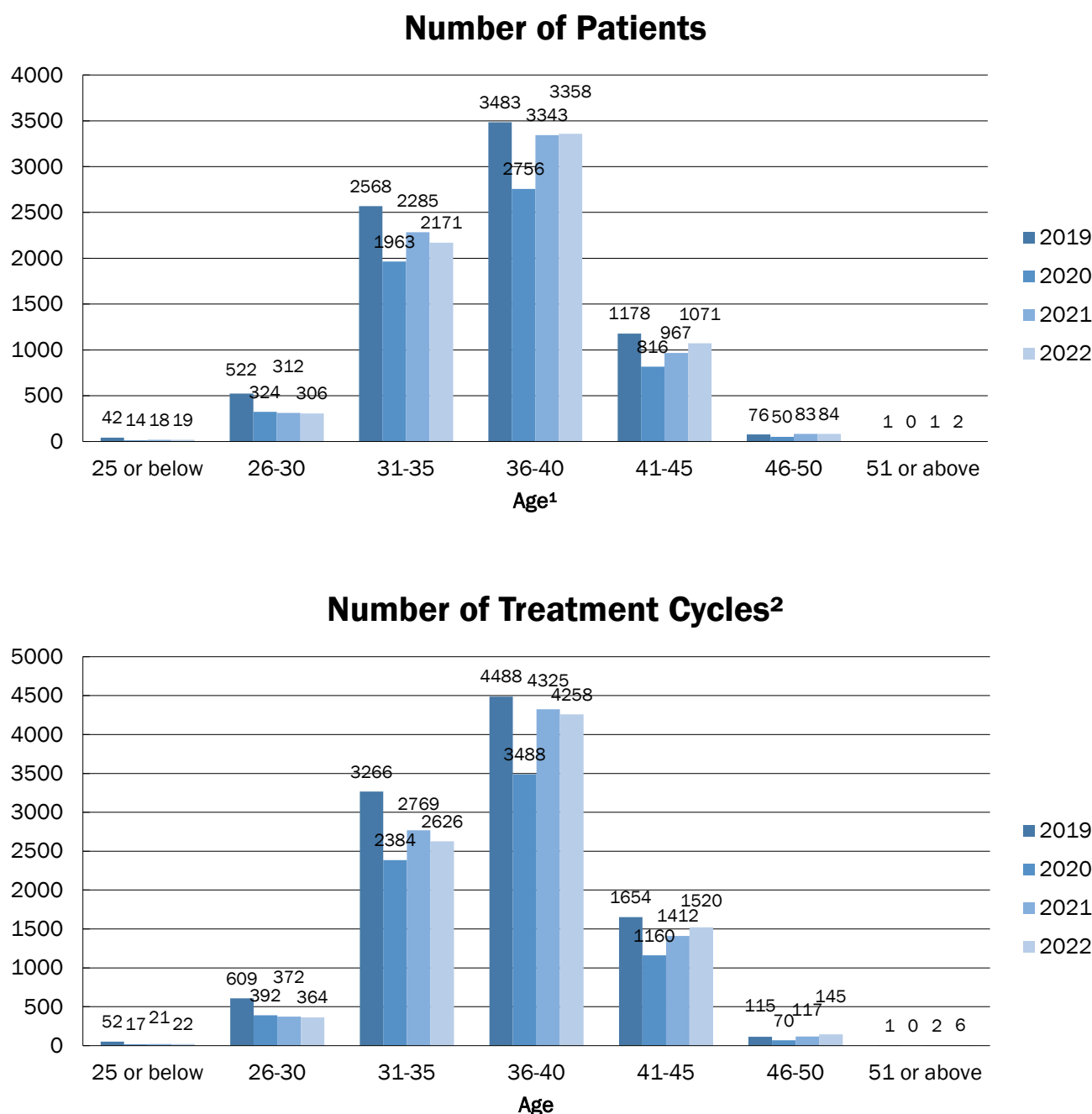
Chart A2 - Patients Diagnosis (%)
(for non-donor IVF cycles only)



Remarks:

- (1) "Other causes" of infertility diagnosis reported by licensed centres included advanced maternal age, reduced ovarian reserve, coital problem, polycystic ovary syndrome, etc.

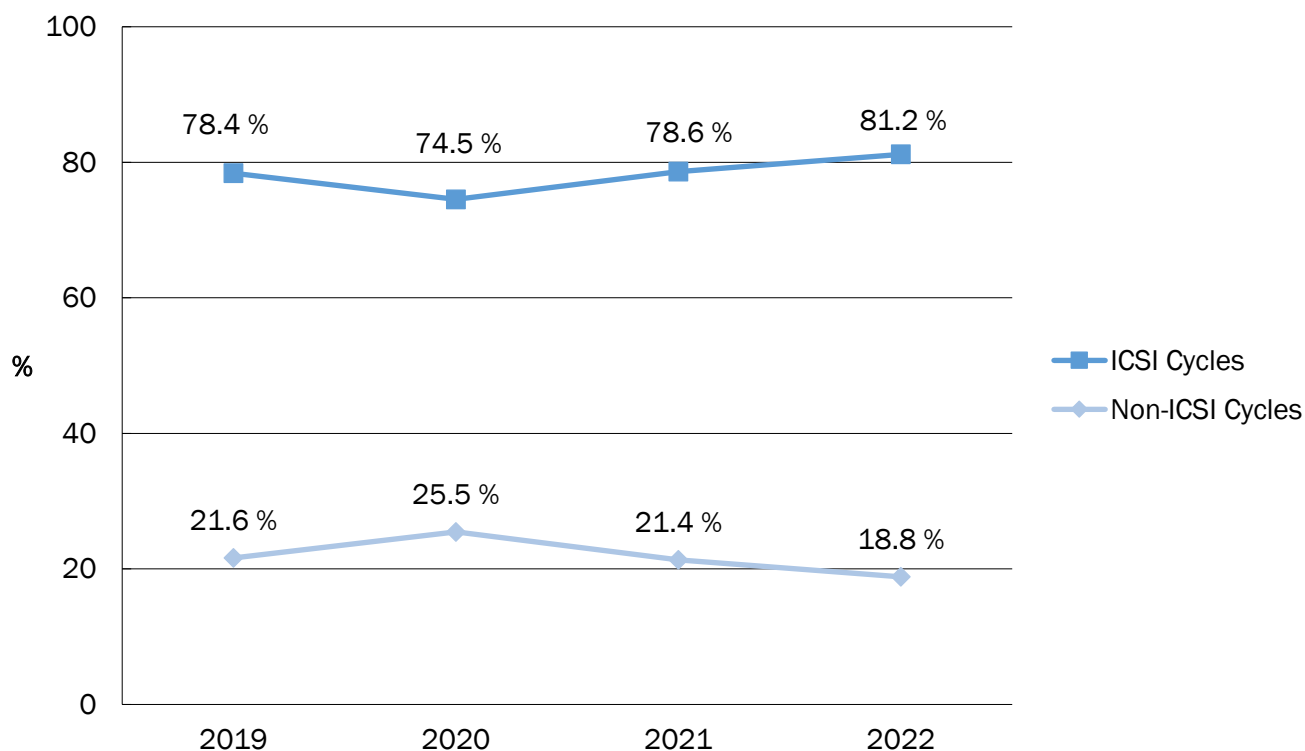
**Chart A5(a) - Number of Patients and Treatment Cycles
(for non-donor IVF cycles only)**



Remarks:

- (1) The age of wife has been used in calculating the age of patient.
- (2) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.
- (ii) In this chart, the treatment cycles for (a) RT procedures involving donated gametes/embryos and (b) involving artificial insemination (i.e. AIH and DI) are excluded from the above chart and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded in the above chart.

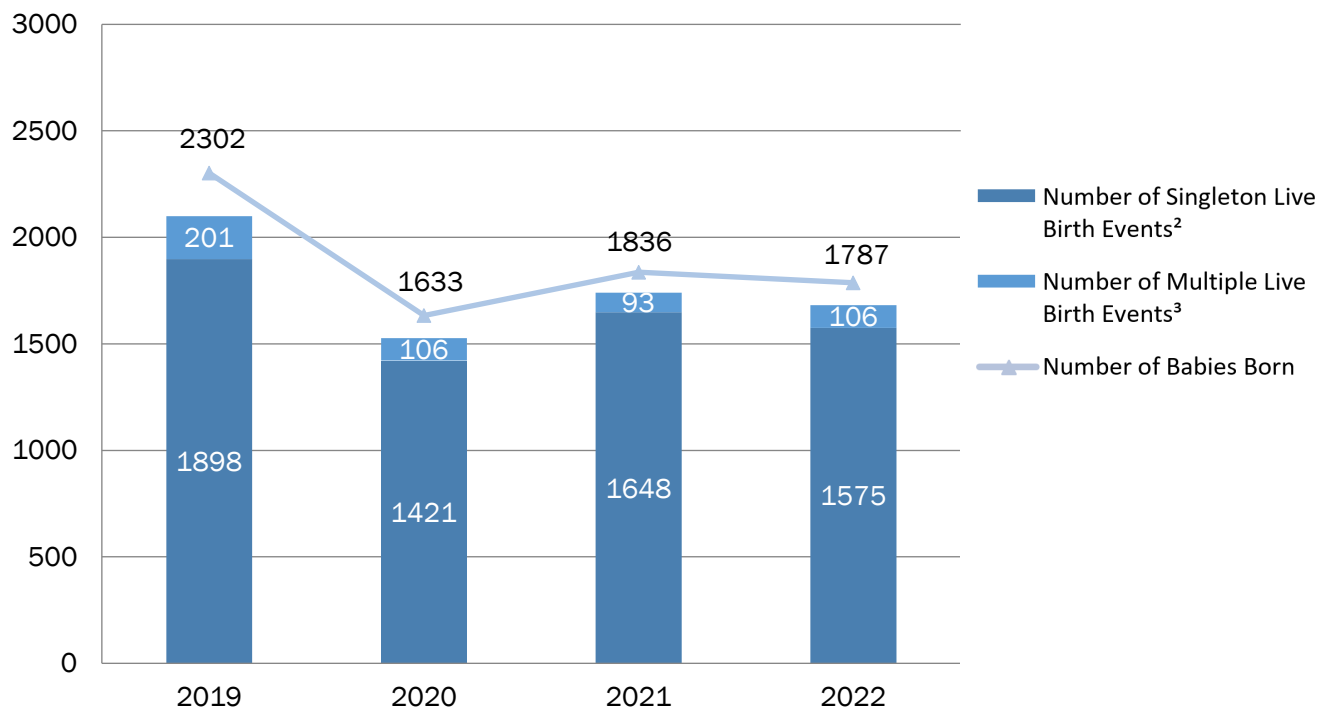
Chart A5(b) - Proportion of ICSI¹ Cycles (%)
(amongst all non-donor IVF cycles²)



Remarks:

- (1) **Intracytoplasmic sperm injection (ICSI)** means a method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
- (2) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.
- (ii) In this chart, the treatment cycles for (a) RT procedures involving donated gametes/embryos and (b) involving artificial insemination (i.e. AIH and DI) are excluded from the above chart and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded in the above chart.

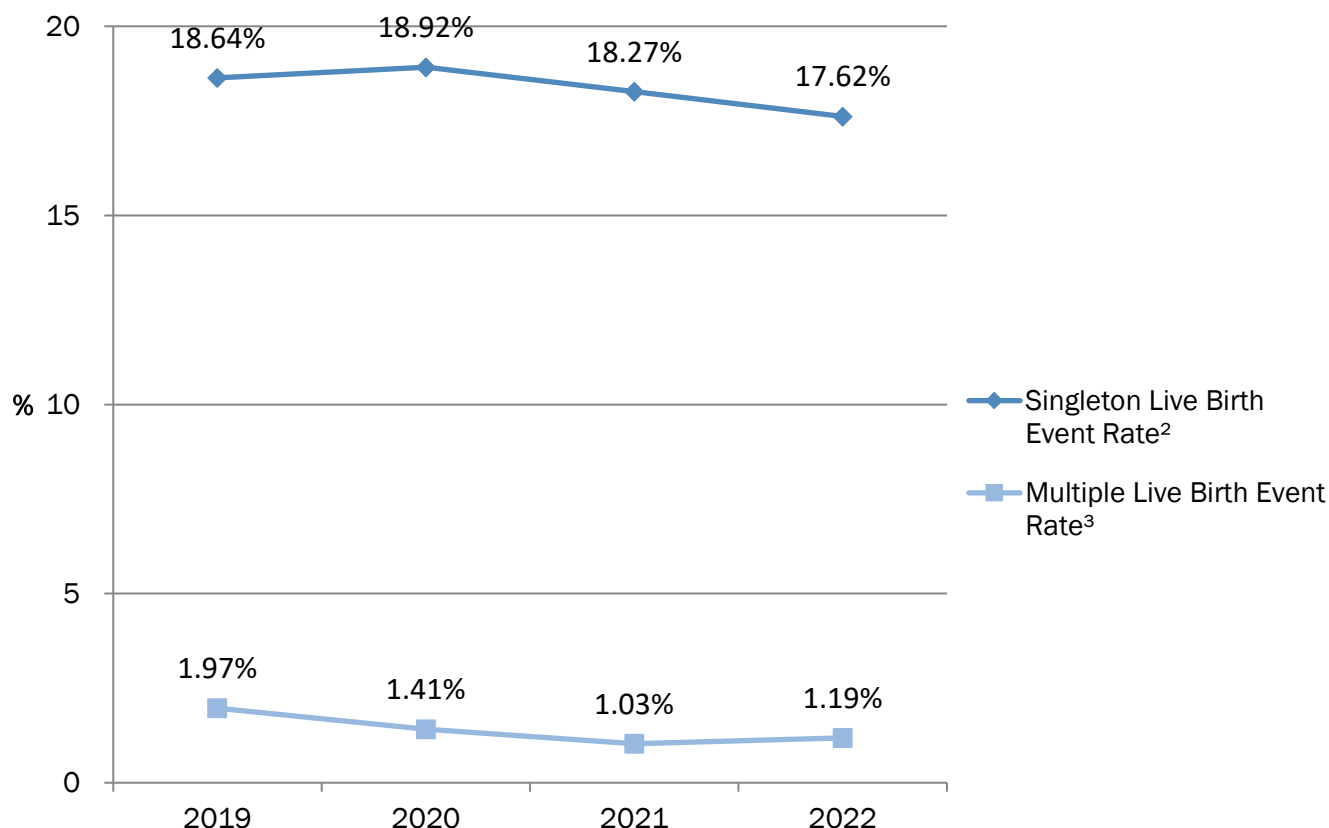
**Chart A5(c) - Number of Live Birth Events¹ and Babies Born
(for non-donor IVF cycles only)**



Remarks:

- (1) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
- (2) **Singleton live birth event** means an event of the birth of one live child from one single pregnancy.
- (3) **Multiple live birth event** means an event of the birth of more than one live child from one single pregnancy.

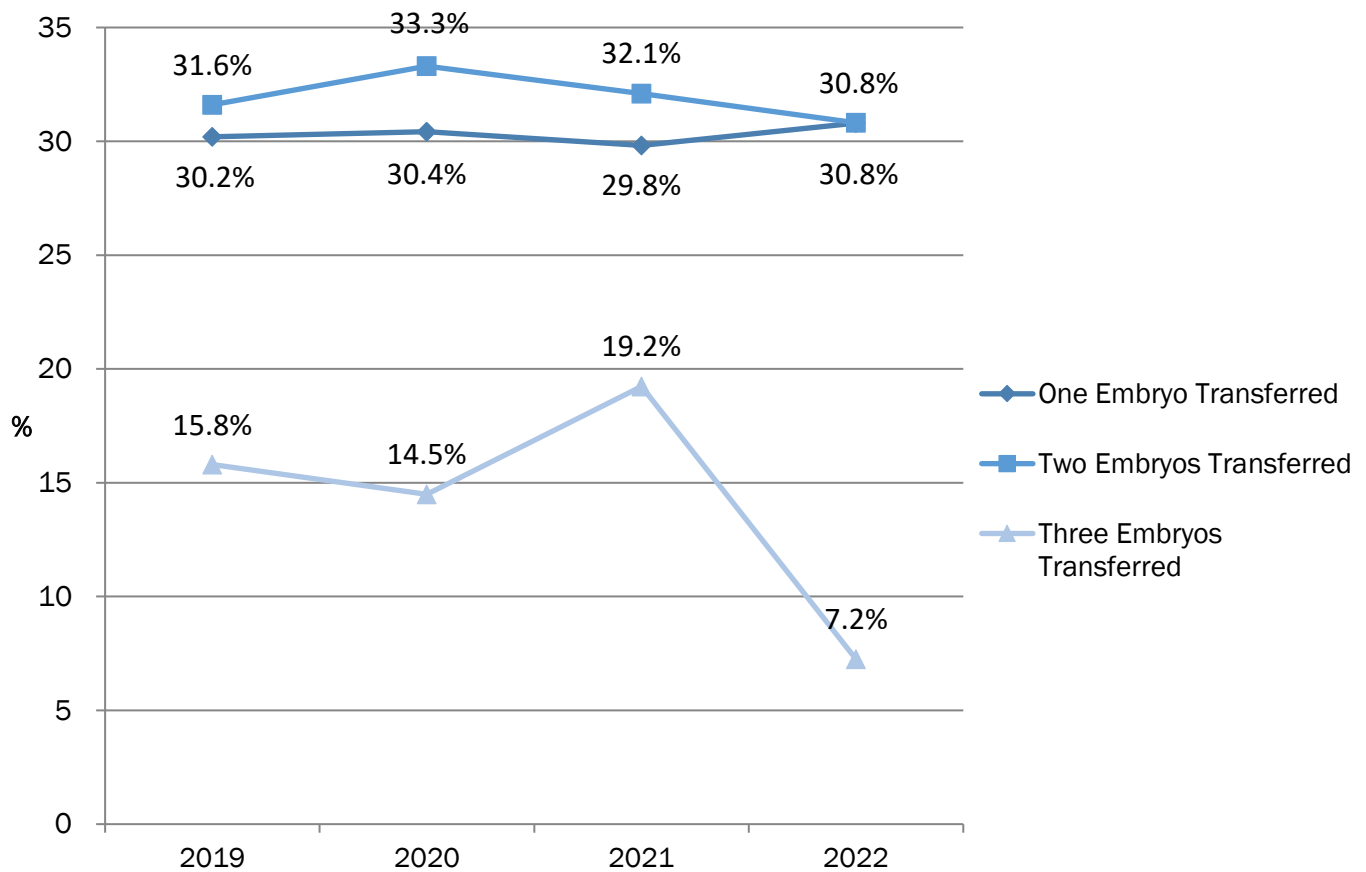
Chart A5(d) - Live Birth Event¹ Rate (%)
(for non-donor IVF cycles only)



Remarks:

- (1) (i) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
 (ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. Live birth event rate = Number of live birth events/Number of treatment cycles x 100%
- (2) (i) **Singleton live birth event** means an event of the birth of one live child from one single pregnancy.
 (ii) **Singleton live birth event rate** is expressed per 100 treatment cycles started, i.e. Singleton live birth event rate = Number of live birth events with one live child born/Number of treatment cycles x 100%
- (3) (i) **Multiple live birth event** means an event of the birth of more than one live child from one single pregnancy.
 (ii) **Multiple live birth event rate** is expressed per 100 treatment cycles started, i.e. Multiple live birth event rate = Number of live birth events with more than one live child born/Number of treatment cycles x 100%

Chart A5(e) - Percentage of Treatment Cycles (with Embryo Transferred) Resulting in Live Birth Events¹ by One, Two and Three Embryos Transferred (%)
(for non-donor IVF cycles only)



Remarks:

- (1) (i) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
- (ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. live birth event rate = Number of live birth events/Number of treatment cycles x 100%

Chart B1(a) - Number of Gametes and Embryos Stored by Licensed Centres

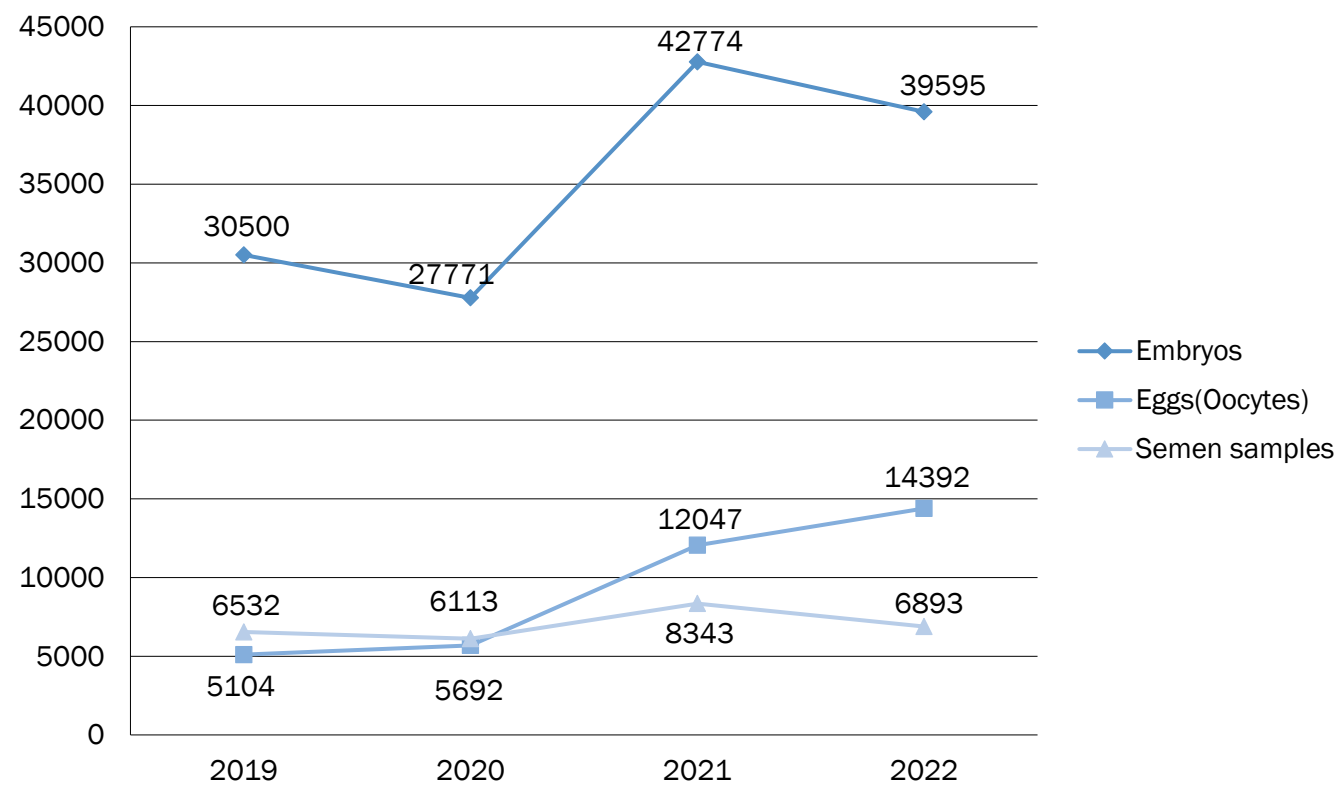
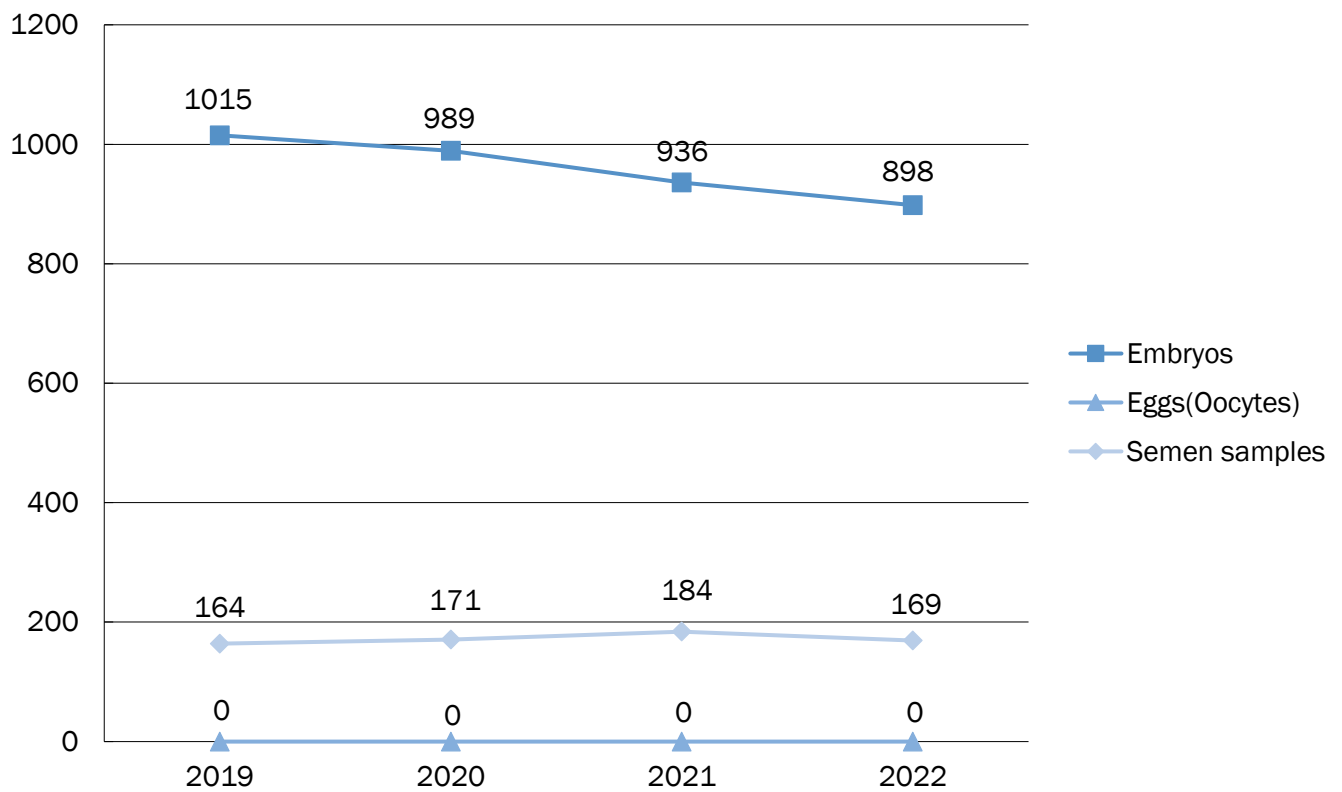


Chart B1(b) - Number of Donated Gametes or Embryos Stored or Used for Research



	Number of Donated Embryos Used for Research			
	2019	2020	2021	2022
Embryos	96	75	0	3

Detailed Statistics Tables

Table 1 - Gamete and Embryo Donations Made in 2022

(Based on the information on Annual Statistics Forms received in the calendar year)

a) Gamete and Embryo Donors by Age Group and Sex

Age Group	Gamete		Embryo		Total
	Female Donors	Male Donors	Female Donors	Male Donors	
25 or below	11	7	0	0	18
26-30	9	5	0	0	14
31-35	3	6	0	0	9
36-40	3	8	0	0	11
41-45	0	1	0	0	1
46-50	0	0	0	0	0
51 or above	0	0	0	0	0
Total	26	27	0	0	53

b) Donors and Donated Materials

Donated Materials	Number of Donors	Number of Donations Made
Semen	27	53
Eggs (oocytes)	26	29
Embryos ¹	0	0

Remark:

(1) Both the female and male donors of the couple will be counted for an embryo donation.

Source (for licensed centres) AS Form 8

Table 2 - Pregnancy and Birth Outcomes for Main Types of RT Procedures in 2022

(Based on the information on Data Collection Forms received in the calendar year)

Item		RT procedures involving patients' own gametes/embryos				RT procedures involving donated gametes/embryos	
		IVF ¹		Frozen-thawed ET	AIH ³	DI ³	RT procedures other than DI
		with ICSI ²	without ICSI				
1	Number of patients	2671	733	3607	2247	5	62
2	Number of treatment cycles ⁴	3388	786	4767	3532	8	100
3	Number of treatment cycles with embryo transferred	551	232	4727	NA	NA	77
4	Number of cycles of insemination	NA	NA	NA	3502	8	NA
Treatment Outcome⁵							
5a	Number of clinical pregnancy ⁶⁽ⁱ⁾	170	78	2129	390	1	41
i	Number of ongoing pregnancy ⁷⁽ⁱ⁾	131	62	1771	339	1	35
ii	Number of miscarriage ⁸	36	14	350	42	0	4
iii	Number of hydatidiform mole	0	0	0	0	0	0
iv	Number of ectopic pregnancy ⁹	3	2	7	9	0	0
v	Number of heterotopic pregnancy ¹⁰	0	0	0	0	0	0
vi	Number of termination of pregnancy	0	0	1	0	0	2
5b	Number of no pregnancy ¹¹	3218	708	2637	3112	7	59
5c	Number of lost to follow up ¹²	0	0	1	30	0	0
5d i	Clinical pregnancy rate ⁶⁽ⁱⁱⁱ⁾ (per treatment cycle) (%)	5.0	9.9	44.7	11.0	12.5	41.0
ii	Clinical pregnancy rate (per treatment cycle with embryo transferred) (%)	30.9	33.6	45.0	NA	NA	53.2
iii	Clinical pregnancy rate (per cycle of insemination) (%)	NA	NA	NA	11.1	12.5	NA
5e i	Ongoing pregnancy rate ⁷⁽ⁱⁱ⁾ (per treatment cycle) (%)	3.9	7.9	37.2	9.6	12.5	35.0
ii	Ongoing pregnancy rate (per treatment cycle with embryo transferred) (%)	23.8	26.7	37.5	NA	NA	45.5
iii	Ongoing pregnancy rate (per cycle of insemination) (%)	NA	NA	NA	9.7	12.5	NA
Pregnancy Outcome							
6a	Number of lost to follow up	3	0	49	19	0	0
6b	Number of live birth events ¹³⁽ⁱ⁾	98	51	1532	283	1	43
i	Number of singleton live birth events ¹⁴⁽ⁱ⁾	91	48	1436	252	1	39
ii	Number of multiple live birth events ¹⁵⁽ⁱ⁾	7	3	96	31	0	4
6c	Live birth event rate ¹³⁽ⁱⁱ⁾ (%)	2.9	6.5	32.1	8.0	12.5	43.0
i	Singleton live birth event rate ¹⁴⁽ⁱⁱ⁾ (%)	2.7	6.1	30.1	7.1	12.5	39.0
ii	Multiple live birth event rate ¹⁵⁽ⁱⁱ⁾ (%)	0.2	0.4	2.0	0.9	0.0	4.0
6d	Total number of babies born	105	54	1628	316	1	47

Remarks:

NA Not applicable

- (1) **In vitro fertilization (IVF)** (a) means the fertilization of an egg by sperm outside the human body, whether or not the egg was originally removed from the body of that or any other woman; (b) includes any procedure involving the induction or aspiration of an egg, or the culture of an egg for the purposes of any such fertilization. It includes **IVF without ICSI** and **IVF with ICSI**.
- (2) **Intracytoplasmic sperm injection (ICSI)** means a method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
- (3) **Artificial insemination** refers to the placing of sperm inside a woman's vagina or uterus (i.e. womb) by means other than sexual intercourse. In **artificial insemination by husband (AIH)**, the husband's sperm is used. In **artificial insemination by donor (AID or DI)**, sperm collected from a man who is not the woman's husband is used.
- (4) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.

This annual statistics only covered treatment cycles that led to (1) Gamete transfer/embryo replacement/insemination, or stopped because of (2) Elective cryopreservation of all embryos or (3) Cycle abandonment.

(ii) In this table, the treatment cycles for RT procedures involving donated gametes/embryos and those involving artificial insemination (i.e. AIH and DI) are shown. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are excluded from the above table.
- (5) Figures on **treatment outcome** reported in the interim statistics will be replaced when outcome of pregnancy is available in the final statistics. Licensed centres are required to report the details concerning **pregnancy outcome** within 12 months after treatment.
- (6) (i) **Clinical pregnancy** means pregnancy documented by one or more gestational sacs on ultrasound or the histological confirmation of gestational products in miscarriages or ectopic pregnancies.

(ii) **Clinical pregnancy rate** is expressed as number of clinical pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer.
 - **Clinical pregnancy rate per treatment cycles** [Item 5d(i)] = Number of clinical pregnancies [Item 5a]/Number of treatment cycles[Item 2] x 100%
 - **Clinical pregnancy rate per treatment cycles with embryo transferred** [Item 5d(ii)] = Number of clinical pregnancies [Item 5a]/Number of treatment cycles with embryo transferred [Item 3] x 100%
 - **Clinical pregnancy rate per cycles of insemination** [Item 5d(iii)] = Number of clinical pregnancies [Item 5a]/Number of cycles of insemination [Item 4] x 100%
- (7) (i) Ongoing pregnancy means ongoing pregnancy with foetal cardiac activity during the period of the year being reported on.

(ii) **Ongoing pregnancy rate** is expressed as number of ongoing pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer.
 - **Ongoing pregnancy rate per treatment cycles** [Item 5e(i)] = Number of ongoing pregnancies [Item 5a(i)]/Number of treatment cycles [Item 2] x 100%
 - **Ongoing pregnancy rate per treatment cycles with embryo transferred** [Item 5e(ii)] = Number of ongoing pregnancies [Item 5a(i)]/Number of treatment cycles with embryo transferred [Item 3] x 100%
 - **Ongoing pregnancy rate per cycles of insemination** [Item 5e(iii)] = Number of ongoing pregnancies [Item 5a(i)]/Number of cycles of insemination [Item 4] x 100%
- (8) Miscarriage (Spontaneous abortion) refers to loss of an intrauterine pregnancy detected clinically or by ultrasound, and less than 24 weeks' gestation (as estimated by the day of embryo transfer or day of ovulation).
- (9) Ectopic pregnancy refers to a pregnancy in which implantation has taken place outside the uterine cavity.
- (10) Heterotopic pregnancy refers to simultaneous existence of intrauterine and ectopic pregnancy.

- (11) Number of no pregnancy refers to the number of treatment cycles started and reported by the licensed centre with an outcome of "no pregnancy", including those abandoned and those ending with elective cryopreservation of embryos.
- (12) Figures on number of lost to follow up cases will be reported in the interim statistics and it will be updated when pregnancy outcome is available in the final statistics.
- (13) (i) Live birth event means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
- (ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. Live birth event rate [Item 6c] = Number of live birth events [Item 6b]/Number of treatment cycles [Item 2] x 100%
- (14) (i) Singleton live birth event means an event of the birth of one live child from one single pregnancy.
- (ii) **Singleton live birth event rate** is expressed per 100 treatment cycles started, i.e. Singleton live birth event rate [Item 6c(i)] = Number of live birth events with one live child born [6b(i)]/Number of treatment cycles [Item 2] x 100%
- (15) (i) Multiple live birth event means an event of the birth of more than one live child from one single pregnancy.
- (ii) **Multiple live birth event rate** is expressed per 100 treatment cycles started, i.e. Multiple live birth event rate [Item 6c(ii)] = Number of live birth events with more than one live child born [6b(ii)]/Number of treatment cycles [Item 2] x 100%

Source (for licensed centres)

DC Form 1, 2, 3, 4 & 7

Table 3 - Pregnancy and Birth Outcomes by Age Group and Main Type of RT Procedures in 2022

(for non-donor treatment cycles only)

(Based on the information on Data Collection Forms received in the calendar year)

IVF¹ (with ICSI²)							
Age Group ⁴	Number of Patients	Number of Treatment Cycles ⁵	Number of Treatment Cycles with Embryo Transferred	Ongoing Pregnancy ⁶		Live Birth Event ⁷	
				n ⁶⁽ⁱ⁾	(%) ⁶⁽ⁱⁱ⁾	n ⁷⁽ⁱ⁾	(%) ⁷⁽ⁱⁱ⁾
25 or below	7	7	0	0	(0.0)	0	(0.0)
26-30	130	142	18	9	(6.3)	9	(6.3)
31-35	800	891	113	29	(3.3)	27	(3.0)
36-40	1198	1478	259	73	(4.9)	52	(3.5)
41-45	493	779	145	17	(2.2)	10	(1.3)
46-50	42	86	13	3	(3.5)	0	(0.0)
51 or above	1	5	3	0	(0.0)	0	(0.0)
Total	2671	3388	551	131	(3.9)	98	(2.9)
IVF (without ICSI)							
Age Group	Number of Patients	Number of Treatment Cycles	Number of Treatment Cycles with Embryo Transferred	Ongoing Pregnancy		Live Birth Event	
				n	(%)	n	(%)
25 or below	2	2	1	1	(50.0)	1	(50.0)
26-30	22	22	4	1	(4.5)	1	(4.5)
31-35	238	243	62	24	(9.9)	17	(7.0)
36-40	404	438	140	30	(6.8)	27	(6.2)
41-45	63	77	24	6	(7.8)	5	(6.5)
46-50	4	4	1	0	(0.0)	0	(0.0)
51 or above	0	NA	NA	NA		NA	
Total	733	786	232	62	(7.9)	51	(6.5)
All IVF (Fresh cycles)							
Age Group	Number of Patients	Number of Treatment Cycles	Number of Treatment Cycles with Embryo Transferred	Ongoing Pregnancy		Live Birth Event	
				n	(%)	n	(%)
25 or below	9	9	1	1	(11.1)	1	(11.1)
26-30	152	164	22	10	(6.1)	10	(6.1)
31-35	1038	1134	175	53	(4.7)	44	(3.9)
36-40	1602	1916	399	103	(5.4)	79	(4.1)
41-45	556	856	169	23	(2.7)	15	(1.8)
46-50	46	90	14	3	(3.3)	0	(0.0)
51 or above	1	5	3	0	(0.0)	0	(0.0)
Total	3404	4174	783	193	(4.6)	149	(3.6)

Frozen-thawed ET							
Age Group	Number of Patients	Number of Treatment Cycles	Number of Treatment Cycles with Embryo Transferred	Ongoing Pregnancy		Live Birth Event	
				n	(%)	n	(%)
25 or below	10	13	13	5	(38.5)	5	(38.5)
26-30	154	200	197	102	(51.0)	94	(47.0)
31-35	1133	1492	1483	672	(45.0)	602	(40.3)
36-40	1756	2342	2322	830	(35.4)	708	(30.2)
41-45	515	664	658	160	(24.1)	122	(18.4)
46-50	38	55	53	2	(3.6)	1	(1.8)
51 or above	1	1	1	0	(0.0)	0	(0.0)
Total	3607	4767	4727	1771	(37.2)	1532	(32.1)
AIH ³							
Age Group	Number of Patients	Number of Treatment Cycles	Number of cycles of insemination	Ongoing Pregnancy		Live Birth Event	
				n	(%)	n	(%)
25 or below	9	15	15	1	(6.7)	1	(6.7)
26-30	174	272	266	29	(10.7)	23	(8.5)
31-35	1020	1607	1595	195	(12.1)	168	(10.5)
36-40	796	1250	1246	104	(8.3)	83	(6.6)
41-45	224	340	334	10	(2.9)	8	(2.4)
46-50	22	44	42	0	(0.0)	0	(0.0)
51 or above	2	4	4	0	(0.0)	0	(0.0)
Total	2247	3532	3502	339	(9.6)	283	(8.0)

Remarks:

NA Not applicable

- (1) **In vitro fertilization (IVF)** (a) means the fertilization of an egg by sperm outside the human body, whether or not the egg was originally removed from the body of that or any other woman; (b) includes any procedure involving the induction or aspiration of an egg, or the culture of an egg for the purposes of any such fertilization. It includes **IVF without ICSI** and **IVF with ICSI**.
- (2) **Intracytoplasmic sperm injection (ICSI)** means a method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
- (3) **Artificial insemination** refers to the placing of sperm inside a woman's vagina or uterus (i.e. womb) by means other than sexual intercourse. In **artificial insemination by husband (AIH)**, the husband's sperm is used. In **artificial insemination by donor (AID or DI)**, sperm collected from a man who is not the woman's husband is used.
- (4) The age of wife has been used in calculating the age of patient.
- (5) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.

This annual statistics only covered treatment cycles that led to (1) gamete transfer/embryo replacement/insemination, or stopped because of (2) elective cryopreservation of all embryos or (3) cycle abandonment.

(ii) In this table, the treatment cycles for RT procedures involving donated gametes/embryos are excluded from the above table and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded from the above table.

(6) **Ongoing pregnancy** means ongoing pregnancy with foetal cardiac activity during the period of the year being reported on.

(i) n = Number of ongoing pregnancies

(ii) **Ongoing pregnancy rate** is expressed as number of ongoing pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer. i.e. $\text{Ongoing pregnancy rate} = \frac{\text{number of ongoing pregnancies [n]}}{\text{Number of treatment cycles}} \times 100\%$

(7) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".

(i) n = Number of live birth events

(ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. $\text{live birth event rate} = \frac{\text{Number of live birth events [n]}}{\text{Number of treatment cycles}} \times 100\%$

Source (for licensed centres)

DC Form 1, 4 & 7

Table 4 - Effect of One/Two/Three Embryo(s) Transferred (Fresh/Frozen Cycle with or without ICSI¹) on Pregnancy and Birth Outcomes² in 2022 (For non-donor IVF cycles only)

(Based on the information on Data Collection Forms received in the calendar year)

One Embryo Transferred													
Age Group ³	Number of Patients	Number of Treatment Cycles ⁴ with Embryo Transferred	Ongoing Pregnancy ⁵		Ongoing Multiple Pregnancy		Live Birth Events ⁶		Singleton Live Birth Events ⁷		Multiple Birth Events ⁸		Number of Babies born
			n ^{5(I)}	(%) ^{5(II)}	n	(%)	n ^{6(I)}	(%) ^{6(II)}	n ^{7(I)}	(%) ^{7(II)}	n ^{8(I)}	(%) ^{8(II)}	
25 or below	10	12	4	(33.3)	0	(0.0)	4	(33.3)	4	(33.3)	0	(0.0)	4
26-30	151	187	97	(51.9)	0	(0.0)	90	(48.1)	90	(48.1)	0	(0.0)	90
31-35	1130	1375	587	(42.7)	14	(1.0)	523	(38.0)	512	(37.2)	11	(0.8)	534
36-40	1716	2108	704	(33.4)	14	(0.7)	590	(28.0)	580	(27.5)	10	(0.5)	600
41-45	438	517	121	(23.4)	0	(0.0)	97	(18.8)	97	(18.8)	0	(0.0)	97
46-50	31	36	1	(2.8)	0	(0.0)	1	(2.8)	1	(2.8)	0	(0.0)	1
51 or above	1	2	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0
Total	3477	4237	1514	(35.7)	28	(0.7)	1305	(30.8)	1284	(30.3)	21	(0.5)	1326

Two Embryos Transferred													
Age Group ³	Number of Patients	Number of Treatment Cycles ⁴ with Embryo Transferred	Ongoing Pregnancy ⁵		Ongoing Multiple Pregnancy		Live Birth Events ⁶		Singleton Live Birth Events ⁷		Multiple Birth Events ⁸		Number of Babies born
			n ^{5(I)}	(%) ^{5(II)}	n	(%)	n ^{6(I)}	(%) ^{6(II)}	n ^{7(I)}	(%) ^{7(II)}	n ^{8(I)}	(%) ^{8(II)}	
25 or below	2	2	2	(100.0)	1	(50.0)	2	(100.0)	1	(50.0)	1	(50.0)	3
26-30	29	32	14	(43.8)	8	(25.0)	14	(43.8)	7	(21.9)	7	(21.9)	21
31-35	244	282	137	(48.6)	40	(14.2)	123	(43.6)	90	(31.9)	33	(11.7)	156
36-40	522	591	225	(38.1)	46	(7.8)	194	(32.8)	152	(25.7)	42	(7.1)	236
41-45	238	277	57	(20.6)	2	(0.7)	38	(13.7)	37	(13.4)	1	(0.4)	39
46-50	17	19	3	(15.8)	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0
51 or above	1	1	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0
Total	1053	1204	438	(36.4)	97	(8.1)	371	(30.8)	287	(23.8)	84	(7.0)	455

Three Embryos Transferred

Age Group ³	Number of Patients	Number of Treatment Cycles ⁴ with Embryo Transferred	Ongoing Pregnancy ⁵		Ongoing Multiple Pregnancy		Live Birth Events ⁶		Singleton Live Birth Events ⁷		Multiple Birth Events ⁸		Number of Babies born
			n ^{5(I)}	(%) ^{5(II)}	n	(%)	n ^{6(I)}	(%) ^{6(II)}	n ^{7(I)}	(%) ^{7(II)}	n ^{8(I)}	(%) ^{8(II)}	
25 or below	0	NA	NA		NA		NA		NA		NA		NA
26-30	0	NA	NA		NA		NA		NA		NA		NA
31-35	1	1	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0
36-40	20	22	4	(18.2)	2	(9.1)	3	(13.6)	2	(9.1)	1	(4.5)	4
41-45	31	33	5	(15.2)	0	(0.0)	2	(6.1)	2	(6.1)	0	(0.0)	2
46-50	8	12	1	(8.3)	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0
51 or above	1	1	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)	0
Total	61	69	10	(14.5)	2	(2.9)	5	(7.2)	4	(5.8)	1	(1.4)	6

Remarks:

NA Not applicable

- (1) **Intracytoplasmic sperm injection (ICSI)** means a method of gamete micromanipulation by which a single sperm is injected into the inner cellular structure of the egg.
- (2) Figures on **treatment outcome** reported in the interim statistics will be replaced when pregnancy outcome is available in the final statistics. Licensed centres are required to report the details concerning **pregnancy outcome** within 12 months after treatment.
- (3) The age of wife has been used in calculating the age of patient.
- (4) (i) **Treatment cycles** refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.

This annual statistics only covered treatment cycles that led to (1) gamete transfer/embryo replacement/insemination, or stopped because of (2) elective cryopreservation of all embryos or (3) cycle abandonment.

(ii) In this table, treatment cycles for (a) RT procedures involving donated gametes/embryos and (b) involving artificial insemination (i.e. AIH and DI) are excluded from the above table and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded from the above table.
- (5) **Ongoing pregnancy** means ongoing pregnancy with foetal cardiac activity during the period of the year being reported on.

(i) n = Number of ongoing pregnancies with single foetus and multiple foetuses.

(ii) **Ongoing pregnancy rate** is expressed as number of ongoing pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer. i.e. Ongoing pregnancy rate = number of ongoing pregnancies [n]/Number of treatment cycles with embryo transferred x 100%
- (6) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".

(i) n = Number of live birth events

(ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. live birth event rate = Number of live birth events [n]/Number of treatment cycles with embryo transferred x 100%

- (7) **Singleton live birth event** means an event of the birth of one live child from one single pregnancy.
- (i) n = Number of live birth events of one live child from one single pregnancy.
 - (ii) **Singleton live birth event rate** is expressed per 100 treatment cycles started, i.e. Singleton live birth event rate = Number of live birth events with one live child born $[n]$ / Number of treatment cycles with embryo transferred $\times 100\%$
- (8) **Multiple live birth event** means an event of the birth of more than one live child from one single pregnancy.
- (i) n = Number of live birth events of more than one live child from one single pregnancy.
 - (ii) **Multiple live birth event rate** is expressed per 100 treatment cycles started, i.e. Multiple live birth event rate = Number of live birth events with more than one live child born $[n]$ / Number of treatment cycles with embryo transferred $\times 100\%$

Source (for licensed centres)

DC Form 1 & 4

**Table 5 - Pregnancy and Birth Outcomes by Age Group using Fresh/Frozen Oocytes (Fresh Cycles) in 2022
(For non-donor IVF cycles only)**

(Based on the information on Data Collection Forms received in the calendar year)

Fresh Cycles Using Fresh Oocytes							
Age Group ¹	Number of Patients	Number of Treatment Cycles ²	Number of Treatment Cycles with Embryo Transferred	Ongoing Pregnancy ³		Live Birth Event ⁴	
				n ³⁽ⁱ⁾	(%) ³⁽ⁱⁱ⁾	n ⁴⁽ⁱ⁾	(%) ⁴⁽ⁱⁱ⁾
25 or below	9	9	1	1	(11.1)	1	(11.1)
26-30	143	150	22	10	(6.7)	10	(6.7)
31-35	990	1076	170	50	(4.6)	42	(3.9)
36-40	1455	1729	383	97	(5.6)	75	(4.3)
41-45	475	698	155	19	(2.7)	11	(1.6)
46-50	36	66	12	3	(4.5)	0	(0.0)
51 or above	1	5	3	0	(0.0)	0	(0.0)
Total	3109	3733	746	180	(4.8)	139	(3.7)

Fresh Cycles Using Frozen Oocytes							
Age Group	Number of Patients	Number of Treatment Cycles	Number of Treatment Cycles with Embryo Transferred	Ongoing Pregnancy		Live Birth Event	
				n	(%)	n	(%)
25 or below	0	NA	NA	NA		NA	
26-30	3	3	0	0	(0.0)	0	(0.0)
31-35	6	6	2	0	0	0	(0.0)
36-40	26	26	10	4	4	2	(7.7)
41-45	24	27	13	3	3	3	(11.1)
46-50	2	2	2	0	0	0	(0.0)
51 or above	0	NA	NA	NA		NA	
Total	61	64	27	7	(10.9)	5	(7.8)

Remarks:

NA Not applicable

(1) The age of wife has been used in calculating the age of patient.

(2) (i) Treatment cycles refers to the process in which a reproductive technology (RT) procedure is carried out, where a woman has undergone ovarian stimulation or monitoring with the intent of having RT procedure, or frozen embryos have been thawed with the intent of transferring them to a woman. A treatment cycle starts (a) on the day when superovulatory drugs are commenced or (b) from the date of the last menstrual period.

(ii) In this table, treatment cycles for (a) RT procedures involving donated gametes/embryos and (b) involving artificial insemination (i.e. AIH and DI) are excluded from the above table and separately shown in Table 2. To avoid double counting, treatment cycles in which one patient engages in more than one type of RT procedure in one cycle (e.g. IVF and FET) are also excluded from the above table.

- (3) **Ongoing pregnancy** means ongoing pregnancy with foetal cardiac activity during the period of the year being reported on.
- (i) n = Number of ongoing pregnancies
- (ii) **Ongoing pregnancy rate** is expressed as number of ongoing pregnancies per 100 treatment cycles started /commenced or per 100 cycles reaching the stage of attempted oocyte retrieval or embryo transfer.
- i.e. Ongoing pregnancy rate = $\text{number of ongoing pregnancies [n]} / \text{Number of treatment cycles} \times 100\%$
- (4) **Live birth event** means an event of the birth of one or more than one live child from one single pregnancy. The birth of live twins, triplets and so on will therefore be considered as a single "live birth event".
- (i) n = Number of live birth events
- (ii) **Live birth event rate** (single and multiple live births included) is expressed per 100 treatment cycles started, i.e. live birth event rate = $\text{Number of live birth events [n]} / \text{Number of treatment cycles} \times 100\%$

Source (for licensed centres)

DC Form 1 & 4

Table 6 - Infertility Diagnosis of Patients in 2022

(Based on the information on Data Collection Forms received in the calendar year)

A) Infertility Diagnosis by Age of Wives Receiving RT Procedures (other than DI and AIH)								
	Age Group (Number of Patients)							
Diagnosis	25 or below	26-30	31-35	36-40	41-45	46-50	51 or above	All
Male factor	4	60	477	606	86	3	0	1236
Tubal problem	3	20	62	69	12	0	0	166
Endometriosis	0	3	61	63	11	0	0	138
Immunologic problem	0	0	5	6	2	0	0	13
Tubo-peritoneal problem	1	8	64	75	10	0	0	158
Ovulatory problem	0	9	60	78	10	0	0	157
Unexplained	0	21	203	338	86	6	0	654
Other causes ³	2	27	192	352	220	30	1	824
Multiple causes - female & male factors	3	55	447	933	382	37	1	1858
Multiple causes - female factors only	0	19	102	174	56	4	0	355
Total	13	222	1673	2694	875	80	2	5559

Remark:

- (1) All treatment cycles for RT procedures involving donated gametes/embryos are excluded.

B) Infertility Diagnosis by Age of Wives Receiving AIH								
	Age Group (Number of Patients)							
Diagnosis	25 or below	26-30	31-35	36-40	41-45	46-50	51 or above	All
Male factor	2	62	380	200	37	3	0	684
Endometriosis	0	3	21	18	0	0	0	42
Ovulatory problem	3	18	82	54	3	0	0	160
Unexplained	1	35	203	125	31	3	1	399
Other causes ³	0	13	105	152	85	11	1	367
Multiple causes - female & male factors	2	40	195	204	61	4	0	506
Multiple causes - female factors only	1	3	34	43	7	1	0	89
Total	9	174	1020	796	224	22	2	2247

C) Reasons for Treatment by Age of Husbands - DI

	Age Group (Number of Patients)							
Reasons	25 or below	26-30	31-35	36-40	41-45	46-50	51 or above	All
Obstructive azoospermia	0	0	0	0	0	0	1	1
Non-obstructive azoospermia	0	0	0	1	1	1	0	3
Severe deficits in semen quality in couples who do not wish to undergo intracytoplasmic sperm injection	0	0	0	0	0	0	0	0
Genetic	0	0	0	0	0	0	0	0
Infectious disease in the male partner (such as HIV)	0	0	0	0	0	0	0	0
Severe rhesus isoimmunisation	0	0	0	0	0	0	0	0
Others	0	0	0	0	0	0	0	0
Multiple causes	0	0	1	0	0	0	0	1
Total	0	0	1	1	1	1	1	5

Remarks:

- (1) Age of wife is used in calculating the age of patient in Infertility Diagnosis by Age of Patients Receiving RT Procedures (other than DI and AIH) and receiving AIH procedures while the age of husband is used in calculating the age of patient in Reasons for Treatment by Age of Patients - DI.
- (2) One patient may undergo more than one type of RT procedure during the calendar year (e.g. both IVF and AIH).
- (3) "Other causes" of infertility diagnosis reported by licensed centres included advanced maternal age, reduced ovarian reserve, coital problem, polycystic ovary syndrome, etc.

Source (for licensed centres)

DC Form 1, 7 and 3 respectively

Table 7 - Current Research Projects ending December 2022

Name of Licensed Centre	Name of Project	Project Duration (in months)
Assisted Reproductive Technology Unit (IVFHK), Prince of Wales Hospital / The Chinese University of Hong Kong	A case-series study to establish preimplantation genetic screening (PGS) and its clinical application	36
Assisted Reproductive Technology Unit (IVFHK), Prince of Wales Hospital / The Chinese University of Hong Kong	Molecular analysis of culture medium samples from embryos of in-vitro fertilisation (IVF) patients	36
Department of Obstetrics & Gynaecology, HKU	Derivation of pre-Good Manufacturing Practice (pre-GMP) - quality Human Expanded Potential Stem Cells (EPSCs) from human preimplantation embryos	36

Remark:

- (1) The full list of all research projects approved by the Council on Human Reproductive Technology ("the Council") could be accessed at the Council's website
https://www.chrt.org.hk/english/embryo/embryo_app.html