

DAFTAR PUSTAKA

- American Society for Reproductive Medicine (ASRM). 2020. Intracytoplasmic Sperm Injection for Non-Male Factor Indication: A Committee Opinion. *Fertility and Sterility*. 114 (2): 239-245.
- Agarwal A, Ahmad M, Sarada B, *et al.* 2020. Sperm DNA Fragmentation: New Guidelines for Doctors. *The World Journal of Men's Health*. 38 (4): 412-471.
- Ainsworth AJ, Barnard EP, Baumgarten S, *et al.* 2020. Intrauterine Insemination Cycles: Prediction of Success and Threshold and Poor Prognosis and Futile Care. *Journal of Assisted Reproduction and Genetics*, 37 (10): 2435-2442.
- Aditi S, Suks M, Waljit S, *et al.* 2020. Male Infertility Due to Testicular Disorder. *Journal of Clinical Endocrinology and Metabolism*, 106 (2): 442-459.
- Agarwal A, Rakesh S, Sajal G, *et al.* 2022. Sperm Morphology Assessment in The Era of Intracytoplasmic Sperm Injection: reliable Results Require Focus on Standardization, Quality Control, and Training. *The World Journal of Men's Health*. 40 (3): 348-356.
- Anggraini N, Vika I. 2018. Indikator Penyebab Infertilitas Pada Wanita Usia Subur. *Jurnal Antara Kebidanan*, 1 (1): 36-45.
- Bayu RP, Shofwal W, Addin T. 2022. Evaluasi Key Performance Indicator Program In Vitro Fertilization di Klinik Permatahati RSUP Dr. Sardjito pada Tahun 2019-2020. *Jurnal Kesehatan Reproduksi*, 9 (1): 41-46.
- Hasan SM, Killick SR. 2003. Effect of Male Age on Infertility: Evidence for Decline in Male Fertility With Increasing Age. *Fertility and Sterility*. 79 (3): 1520- 1527.
- Hotaling JM, James FS, Mitchell R, *et al.* 2011. The Relationship Between Isolated Teratozoospermia and Clinical Pregnancy After In Vitro Fertilization With Or Without Intracytoplasmic Sperm Injection. A Systematic Review and Meta-Analysis. *Fertility and Sterility*. 95 (3): 1142-1144.
- Jamal W, Maria P, Armand Z, *et al.* 2012. Surgically Retrieved Spermatozoa Versus Ejaculated Spermatozoa in Modified Natural IVF-ICSI Cycles. *Reprod Biomed Online*, 25 (3): 242-247.
- Kamila NN, Keisha AD, Khalisa AR. 2023. Perspektif Hukum Islam Tentang Teknologi Reproduksi In Vitro Fertilization. *Jurnal Kajian Islam Kontemporer*, 1 (1): 1-25.
- Loutradi KE, Tarlatzis BC, Goulls DG, *et al.* 2006. The Effects of Sperm Quality on Embryo Development after Intracytoplasmic Sperm Injection. *Journal of Assisted Reproduction and Genetics*, 23 (2): 69-74.
- Lestari W, Triyana S. 2015. Fragmentasi DNA Spermatozoa: Penyebab, Deteksi, dan Implikasinya pada Infertilitas Laki-laki. *Jurnal Kedokteran Indonesia*. 3 (5): 153-159.

- Lestariyanto. 2018. Hubungan Kualitas Sperma dan Umur Suami dengan Kualitas Embrio pada Pasien yang Menjalani In Vitro Fertilization di Klinik Sekar RSUD Dr Moewardi. Skripsi. Universitas Sebelas Maret.
- Lusine A, Chia NK, Marcele C, *et al.* 2020. Assessing The Impact of Semen Quality on Embryo Development in an Egg Donation Model. Department of Obstetrics, Gynecology and Reproductive Sciences, University of California, San Fransisco. 2 (1): 22-28.
- Layonal G, Acosta C, Lisset C, *et al.* 2021. Correlation Between Sperm DNA Fragmentation Index ND Semen Parameter in 418 Men Seen at a Fertility Centre. *JBRA Assisted Reproduction*, 25 (3): 349-357.
- Leelabati B, Katarzyna T, Warif E, *et al.* 2021. Meiosis Interrupted: The Genetics of Female Infertility via Meiotic Failure. *Society for Reproduction and Fertility*, 161 (2): 13-35.
- Molina RE, Martini AC, Tissera A, *et al.* 2010. Semen Quality and Aging: Analysis of 9.168 samples in Cordoba, Argentina. *Arch Esp Urol*, 63 (3): 214-221.
- Nusrat M, Fariha NM. 2021. A Tale of Louise Joy Brown: Story Goes On. *Bangladesh Journal of Fertility and Sterility*, 1 (1): 47-51.
- Nasikhin, Baiti A, Ismutik I. 2022. Teknologi Bayi Tabung dalam Tinjauan Hukum Islam. *Journal Article Maqasidi*, 9 (1): 52-66.
- Palermo GD, Neri QV, Fields T, *et al.* 2013. Popularity of Intracytoplasmic Sperm Injection: Biennial Review of Infertility. *Springer Link*. 233-244.
- Perhimpunan Fertilisasi In Vitro Indonesia (PERFITRI). 2021. Mini Symposium Fakultas Kedokteran Universitas Muhamadiyah Jakarta.
- Purwaningrum DH, Dwiningsih SR. 2021. Relationship of Female Age and Sperm Quality with The Successful of IUI Literature Review. *Indonesian Midwifery and Health Sciences Journal*, 5 (3): 232-241.
- Riset Kesehatan Dasar (Riskesdas). 2013. Prevalensi Infertilitas di Indonesia. Kemenkes RI.
- Riset Kesehatan Dasar (Riskesdas). 2013. Prevalensi Infertilitas di Indonesia. Kemenkes RI.
- Rudiyanto. 2017. Perbandingan Hasil Fertilisasi In Vitro antara Sperma yang Berasal dari Ejakulat dengan Sperma yang Berasal dari Teknik TESA/MESA. Skripsi. Universitas Medan Area.
- Rahman N, Eugenius PG, Agung D. 2022. Pengaruh Kualitas Sperma terhadap Kualitas Embryo pada Pasangan yang Menjalani IVF di RSUP Dr. Sardjito. *Jurnal Kesehatan Reproduksi*, 10 (3): 177-184.

- Simon L, Judit C, Rafael O, *et al.* 2011. Relationship Between Human Sperm Protamines, DNA Damage and Assisted Reproduction Outcomes. *Reproductive Medicine Online*, 23 (6): 724-734.
- Sedo CA, Melina B, Daniel L, *et al.* 2017. Effect Sperm of DNA Fragmentation on Embryo Development: Clinical and Biological Aspect. *JBRA Assisted Reproduction*, 21 (4): 343-350.
- Soni A, Shivali S, Sachin G. 2018. Polycystic Ovary Syndrome: Pathogenesis, Treatment and Secondary Associated Disease. *Journal of Drug Delivery and Therapeutic*, 8 (5):107-112.
- Popal W, Zolt PN. 2013. Laboratory Processing and Intracytoplasmic Sperm Injection Using Epididymal and Testicular Spermatozoa: What Can Be Done to Improve IVF Outcomes. *Reproductive Biology Associate*, 1 (1): 125-130.
- Vos AD, Hilde VD, Hubert J, *et al.* 2003. Influence of Individual Sperm Morphology on Fertilization, Embryo Morphology and Pregnancy Outcome of Intracytoplasmic Sperm Injection. *Fertility and Sterility*. 79 (1): 42-48.
- World Health Organization. 2010. Laboratory Manual for Examination and Processing of Human Semen 5th Edition. WHO Press. Switzerland.
- Zheng D, Ceng L. Yang R, *et al.* 2019. Intra Cytoplasmic Sperm Injection (ICSI) Versus Conventional In Vitro Fertilization (IVF) in Couples with Non-Severe Male Infertility. *Reproductive Medicine Protocol*, 9 (9): 1-8.



LAMPIRAN

Lampiran 1. Data Fertilization Rate dan Cleavage Rate Pasien Bayi Tabung di RSAB Harapan Kita

No	Nomor MR	Konsentrasi sp	Motilitas sp	Morfologi sp	oocyte	icsi	fert	cleavage	Persen Fert	Persen cleavage	Umur Suami
1	934005	25.5	33	1	9	7	6	6	86	86	31
2	952215	211	76	7	19	16	6	5	38	31	34
3	951901	9.6	58	0	13	12	7	6	58	50	37
4	944028	0.1	50	0	7	6	2	2	33	33	42
5	925891	90	67	3	17	14	10	7	71	50	32
6	952428	4.7	19	0	3	2	1	1	50	50	43
7	952319	0.1	50	0	4	4	3	3	75	75	39
8	884137	13.5	68	0	12	11	9	9	82	82	31
9	950022	11.9	20	2	25	23	20	18	87	78	31
10	952703	92	62	3	8	6	6	6	100	100	42
11	949565	157	55	3	6	5	4	4	80	80	31
12	934138	0.4	50	0	8	6	5	5	83	83	52
13	949094	12.4	77	1	12	12	4	4	33	33	35
14	471523	1.7	24	0	5	5	1	1	20	20	45
15	952584	38	26	2	8	5	2	2	40	40	41
16	951922	23.5	68	1	6	5	2	2	40	40	28
17	952586	8.6	72	1	21	15	4	4	27	27	29
18	947891	115	65	5	5	5	5	5	100	100	34
19	951007	129	65	4	13	11	7	7	64	64	34
20	950607	77	65	6	15	12	11	11	92	92	33
21	954038	109	69	2	14	13	0	0	0	0	38
22	954654	4.8	56	1	6	6	3	3	50	50	33
23	857956	0.1	5	0	19	13	10	10	77	77	51
24	952256	50	50	2	4	4	3	3	75	75	57
25	943419	25.4	54	1	13	8	2	2	25	25	37
26	954327	72	63	3	15	14	4	3	29	21	39
27	944176	14	31	1	1	1	1	1	100	100	39
28	953649	76	81	1	9	6	5	5	83	83	36
29	948252	26.7	21	1	6	6	2	2	33	33	43
30	953094	102	66	3	16	16	8	8	50	50	37
31	883964	122	66	3	18	18	12	12	67	67	32
32	946836	82	63	1	3	3	1	1	33	33	52
33	927365	40	63	3	24	20	9	9	45	45	51
34	927011	75	44	1	3	3	2	2	67	67	39
35	944939	86	72	1	10	9	7	7	78	78	42
36	935626	76	61	1	12	11	9	9	82	82	30
37	953894	73	53	0	20	17	4	4	24	24	36
38	954345	82	72	1	6	6	3	3	50	50	34
39	955682	0.6	50	0	18	18	10	10	56	56	45
40	952869	66	54	1	4	4	0	0	0	0	43
41	951985	2.2	68	0	5	4	4	4	100	100	46
42	937547	8	16	1	23	20	9	9	45	45	33
43	848280	83	56	5	4	4	4	4	100	100	33
44	957073	0.1	50	0	6	5	4	4	80	80	34
45	907280	44	48	1	1	1	1	1	100	100	43

47	46	955878	125	59	4	7	5	4	4	80	80	42
48	47	957061	61	68	3	19	15	11	11	73	73	32
49	48	957168	55	70	5	1	1	1	1	100	100	30
50	49	955182	100	66	3	21	16	9	9	56	56	40
51	50	926016	121	65	5	12	7	4	3	57	43	43
52	51	948024	12.7	57	1	10	7	3	3	43	43	42
53	52	954367	41.5	67	1	13	9	1	1	11	11	53
54	53	955170	12	83	0	8	6	5	5	83	83	36
55	54	957051	72	46	1	25	25	13	12	52	48	33
56	55	957846	5.6	64	2	7	7	5	5	71	71	41
57	56	958451	100	58	5	32	16	9	9	56	56	37
58	57	937474	76	59	2	16	9	8	8	89	89	39
59	58	958116	0.8	38	0	7	5	2	2	40	40	43
60	59	935822	29	62	1	22	15	5	5	33	33	33
61	60	958340	0.1	50	0	21	19	8	8	42	42	36
62	61	930163	90	57	4	1	1	1	1	100	100	39
63	62	939631	112	66	1	11	10	3	3	30	30	30
64	63	926540	72	29	8	15	11	6	6	55	55	38
65	64	939408	128	57	3	25	19	14	14	74	74	36
66	65	917186	0.1	50	0	2	2	1	1	50	50	44
67	66	957734	15.3	51	0	2	2	1	1	50	50	45
68	67	956945	2.7	56	0	7	7	6	6	86	86	29
70	958762	0.1	50	0	10	10	1	1	10	10	31	
71	959047	39	72	2	19	15	4	4	27	27	36	
72	182369	93	60	3	4	3	3	3	100	100	30	
73	958696	74	62	5	6	6	5	4	83	67	39	
74	959567	67	64	4	10	9	8	8	89	89	39	
75	958425	51	39	2	10	9	7	7	78	78	39	
76	957346	81	66	4	26	23	8	8	35	35	35	
77	952635	47	68	1	8	8	4	4	50	50	35	
78	938486	24	67	1	3	3	2	2	67	67	41	
79	813273	41	61	1	12	12	8	8	67	67	30	
80	959434	0.1	50	0	11	10	7	7	70	70	40	
81	957859	204	49	5	5	4	2	2	50	50	40	
82	836103	14.9	28	1	5	3	3	3	100	100	35	
83	953387	20	15	1	6	6	5	5	83	83	41	
84	946159	17.6	23	2	19	17	11	11	65	65	39	
85	958106	80	51	2	4	3	3	3	100	100	34	
86	960724	170	59	1	21	21	12	12	57	57	34	
87	935884	49	67	1	1	1	1	1	100	100	40	
88	960894	0.9	33	0	24	20	14	12	86	86	33	
89	955477	3	80	0	5	5	4	4	80	80	45	
90	959368	134	84	6	1	1	1	1	100	100	37	
91	960686	102	63	3	23	22	14	14	64	64	31	
92	924515	81	53	1	2	2	1	1	50	50	43	

93	950813	173	62	5	6	5	3	3	60	60	38
94	978036	24.1	13	2	16	16	13	12	81	75	43
95	952961	174	61	2	16	10	7	7	70	70	43
96	961117	26.2	50	1	10	7	3	3	43	43	37
97	951335	13.3	55	2	7	4	2	2	50	50	37
98	960380	74	67	4	22	16	9	9	56	56	37
99	894863	76	54	3	20	16	10	10	63	63	38
100	942870	53	70	1	1	1	0	0	0	0	46
101	960722	89	67	4	1	1	1	1	100	100	37
102	957735	22	50	1	27	23	18	18	78	78	31
103	322777	3.5	14	1	17	16	8	8	50	50	36
104	961127	140	46	2	32	26	20	20	77	77	46
105	959503	7.9	69	2	12	12	10	10	83	83	34
106	955316	236	35	2	5	5	3	3	60	60	29
107	962523	52	75	1	11	10	7	7	70	70	46
108	956397	35	74	2	11	10	4	3	40	30	35
109	960493	6.1	77	1	5	5	4	4	80	80	35
110	936833	28.5	67	2	8	7	4	4	57	57	39
111	924515	97	66	3	2	2	2	2	100	100	43
112	956681	57	30	2	19	15	5	5	33	33	41
113	904782	53	72	3	4	4	4	4	100	100	35
114	961520	1	80	0	10	10	8	8	80	80	43
115	963323	80	56	3	13	10	5	5	50	50	45
116	961659	135	48	5	1	1	0	0	0	0	43
117	944856	108	71	3	8	7	4	4	57	57	36
118	963592	0.5	60	0	13	11	9	9	82	82	47
119	896736	11.4	68	3	1	1	1	1	100	100	33
120	950392	0.8	38	0	1	1	1	1	100	100	40
121	962067	2.1	19	0	35	34	21	21	62	62	34
122	962576	22.1	52	1	11	11	10	10	90	90	30
123	943547	0.1	50	0	18	16	9	9	56	56	29
124	962151	145	73	2	6	6	6	6	100	100	54
125	941841	6.1	69	0	18	16	12	12	75	75	30
126	964281	109	76	2	16	15	10	10	67	67	39
127	963200	35	56	3	5	5	3	2	60	40	37
128	930576	123	78	6	3	2	2	2	100	100	31
129	963138	65	56	2	9	8	3	3	38	38	54
130	959896	33	70	1	11	9	3	3	33	33	30
131	964318	0.1	50	0	9	8	6	6	75	75	34
132	916795	33.5	50	0	18	15	9	9	60	60	37
133	961659	80	31	3	1	1	1	1	100	100	45
134	961659	20.5	50	0	15	11	9	9	82	82	42
135	965364	175	58	6	11	8	4	4	50	50	47
136	964897	0.1	50	0	12	12	11	11	92	92	43
137	964835	81	71	5	9	8	5	5	63	63	36
138	943386	35	54	2	9	7	4	4	57	57	31
139	952239	27.5	55	1	21	17	13	13	76	76	36
140	965226	62	71	6	14	13	12	12	92	92	45
141	950142	46	61	2	19	19	11	11	58	58	30
142	965376	61	62	5	1	1	1	1	100	100	37
143	965499	197	44	8	25	22	14	14	64	64	42
144	966335	12.8	40	0	5	4	3	3	75	75	39

Lampiran 2: Hasil Analisis Univariat

Fertilization rate

	Frequency	Percent	Valid Percent	Cumulative Percent
Rendah	70	48.6	48.6	48.6
Normal	74	51.4	51.4	100.0
Total	144	100.0	100.0	

Cleavage rate

	Frequency	Percent	Valid Percent	Cumulative Percent
Rendah	73	50.7	50.7	50.7
Normal	71	49.3	49.3	100.0
Total	144	100.0	100.0	

Konsentrasi sperma

	Frequency	Percent	Valid Percent	Cumulative Percent
Normal	101	70.1	70.1	70.1
Abnormal	43	29.9	29.9	100.0
Total	144	100.0	100.0	

Motilitas sperma

	Frequency	Percent	Valid Percent	Cumulative Percent
Normal	128	88.9	88.9	88.9
Abnormal	16	11.1	11.1	100.0
Total	144	100.0	100.0	

Morfologi aperma

	Frequency	Percent	Valid Percent	Cumulative Percent
Normal	27	18.8	18.8	18.8
Abnormal	117	81.3	81.3	100.0
Total	144	100.0	100.0	

Normozoospermia

	Frequency	Percent	Valid Percent	Cumulative Percent
tidak	120	83.3	83.3	83.3
Iya	24	16.7	16.7	100.0
Total	144	100.0	100.0	

Azoospermia

	Frequency	Percent	Valid Percent	Cumulative Percent
Tidak	141	97.9	97.9	97.9
Iya	3	2.1	2.1	100.0
Total	144	100.0	100.0	

Usia suami

	Frequency	Percent	Valid Percent	Cumulative Percent
25 - 30 Tahun	13	8.5	9.0	9.0
31 - 40 Tahun	83	54.2	57.6	66.7
>40 tahun	48	31.4	33.3	100.0
Total	144	94.1	100.0	
Missing System	9	5.9		
Total	153	100.0		

Lampiran 3: Hasil Analisis Bivariat Konsentrasi, Motilitas dan Morfologi Sperma Terhadap *Fertilization Rate*

Case Processing Summary						
	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
Konsentrasi sperma *	144	100.0%	0	0.0%	144	100.0%
Fertilisasi rate						

Konsentrasi sperma * Fertilisasi rate Crosstabulation			
		Fertilisasi rate	
		Rendah	Normal
Konsentrasi sperma	Count	52	49
	Expected Count	49.1	51.9
	% within Konsentrasi sperma	51.5%	48.5%
Konsentrasi sperma	Count	18	25
	Expected Count	20.9	22.1
	% within Konsentrasi sperma	41.9%	58.1%
Konsentrasi sperma	Count	70	74
	Expected Count	70.0	74.0
	% within Konsentrasi sperma	48.6%	51.4%

Chi-Square Tests

	Value	df	Asymptotic Significance (2- sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)
Pearson Chi-Square	1.118 ^a	1	.290	.363	.191
Continuity Correction ^b	.766	1	.381		
Likelihood Ratio	1.123	1	.289		
Fisher's Exact Test					
Linear-by-Linear Association	1.111	1	.292		
N of Valid Cases	144				

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 20.90.

b. Computed only for a 2x2 table

Risk Estimate

		95% Confidence Interval	
		Lower	Upper
Odds Ratio for Konsentrasi sperma (Normal / Abnormal)	1.474	.717	3.030
For cohort Fertilisasi rate = Rendah	1.230	.825	1.835
For cohort Fertilisasi rate = Normal	.834	.604	1.153
N of Valid Cases	144		

Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
Motilitas sperma * Fertilisasi rate	144	100.0%	0	0.0%	144	100.0%

Motilitas sperma * Fertilisasi rate Crosstabulation

		Fertilisasi rate		
		Rendah	Normal	
Count	Count	61	67	128
	Expected Count	62.2	65.8	128.0
	% within Motilitas sperma	47.7%	52.3%	100.0%
Count	Count	9	7	16
	Expected Count	7.8	8.2	16.0
	% within Motilitas sperma	56.3%	43.8%	100.0%
Count	Count	70	74	144
	Expected Count	70.0	74.0	144.0
	% within Motilitas sperma	48.6%	51.4%	100.0%

Chi-Square Tests

	Value	df	Asymptotic Significance (2- sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)
Pearson Chi-Square	.420 ^a	1	.517	.601	.351
Continuity Correction ^b	.147	1	.702		
Likelihood Ratio	.421	1	.516		
Fisher's Exact Test					
Linear-by-Linear Association	.418	1	.518		
N of Valid Cases	144				

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 7,78.

b. Computed only for a 2x2 table

Risk Estimate

		95% Confidence Interval	
		Lower	Upper
Odds Ratio for Motilitas sperma (Normal / Abnormal)	.708	.249	2.017
For cohort Fertilisasi rate = Rendah	.847	.530	1.354
For cohort Fertilisasi rate = Normal	1.196	.670	2.136
N of Valid Cases	144		

Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
Morfologi aperma * Fertilisasi rate	144	100.0%	0	0.0%	144	100.0%

Morfologi aperma * Fertilisasi rate Crosstabulation

		Fertilisasi rate		
		Rendah	Normal	
	Count	13	14	27
	Expected Count	13.1	13.9	27.0
	% within Morfologi aperma	48.1%	51.9%	100.0%
	Count	57	60	117
	Expected Count	56.9	60.1	117.0
	% within Morfologi aperma	48.7%	51.3%	100.0%
	Count	70	74	144
	Expected Count	70.0	74.0	144.0
	% within Morfologi aperma	48.6%	51.4%	100.0%

Chi-Square Tests

	Value	df	Asymptotic Significance (2- sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)
Pearson Chi-Square	.003 ^a	1	.957	1.000	.564
Continuity Correction ^b	.000	1	1.000		
Likelihood Ratio	.003	1	.957		
Fisher's Exact Test					
Linear-by-Linear Association	.003	1	.958		
N of Valid Cases	144				

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 13,13.

b. Computed only for a 2x2 table

Risk Estimate

		95% Confidence Interval	
		Lower	Upper
Odds Ratio for Morfologi aperma (Normal / Abnormal)	.977	.423	2.258
For cohort Fertilisasi rate = Rendah	.988	.641	1.524
For cohort Fertilisasi rate = Normal	1.011	.675	1.515
N of Valid Cases	144		



Lampiran 4: Hasil Analisis Bivariat Konsentrasi, Motilitas dan Morfologi Sperma Terhadap *Cleavage Rate*

Case Processing Summary						
	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
Konsentrasi sperma * Cleavage rate	144	100.0%	0	0.0%	144	100.0%

Konsentrasi sperma * Cleavage rate Crosstabulation				
		Cleavage rate		
		Rendah	Normal	
Rendah	Count	56	45	101
	Expected Count	51.2	49.8	101.0
	% within Konsentrasi sperma	55.4%	44.6%	100.0%
Normal	Count	17	26	43
	Expected Count	21.8	21.2	43.0
	% within Konsentrasi sperma	39.5%	60.5%	100.0%
Total	Count	73	71	144
	Expected Count	73.0	71.0	144.0
	% within Konsentrasi sperma	50.7%	49.3%	100.0%

Chi-Square Tests

	Value	df	Asymptotic Significance (2- sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)
Pearson Chi-Square	3.055 ^a	1	.081	.102	.059
Continuity Correction ^b	2.451	1	.117		
Likelihood Ratio	3.070	1	.080		
Fisher's Exact Test					
Linear-by-Linear Association	3.033	1	.082		
N of Valid Cases	144				

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 21.20.

b. Computed only for a 2x2 table

Risk Estimate

		95% Confidence Interval	
		Lower	Upper
Odds Ratio for Konsentrasi sperma (Normal / Abnormal)	1.903	.920	3.935
For cohort Cleavage rate = Rendah	1.402	.932	2.111
For cohort Cleavage rate = Normal	.737	.532	1.020
N of Valid Cases	144		

Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
Motilitas sperma * Cleavage rate	144	100.0%	0	0.0%	144	100.0%

Motilitas sperma * Cleavage rate Crosstabulation

		Cleavage rate		
		Rendah	Normal	
Count	Count	64	64	128
	Expected Count	64.9	63.1	128.0
	% within Motilitas sperma	50.0%	50.0%	100.0%
Count	Count	9	7	16
	Expected Count	8.1	7.9	16.0
	% within Motilitas sperma	56.3%	43.8%	100.0%
Count	Count	73	71	144
	Expected Count	73.0	71.0	144.0
	% within Motilitas sperma	50.7%	49.3%	100.0%

Chi-Square Tests

	Value	df	Asymptotic Significance (2- sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)
Pearson Chi-Square	.222 ^a	1	.637	.792	.419
Continuity Correction ^b	.043	1	.837		
Likelihood Ratio	.223	1	.637		
Fisher's Exact Test					
Linear-by-Linear Association	.221	1	.638		
N of Valid Cases	144				

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 7,89.

b. Computed only for a 2x2 table

Risk Estimate

		95% Confidence Interval	
		Lower	Upper
Odds Ratio for Motilitas sperma (Normal / Abnormal)	.778	.273	2.215
For cohort Cleavage rate = Rendah	.889	.558	1.416
For cohort Cleavage rate = Normal	1.143	.639	2.045
N of Valid Cases	144		

Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
Morfologi apherma * Cleavage rate	144	100.0%	0	0.0%	144	100.0%

Morfologi apherma * Cleavage rate Crosstabulation

		Cleavage rate		
		Rendah	Normal	
Morfologi apherma	Count	13	14	27
	Expected Count	13.7	13.3	27.0
	% within Morfologi apherma	48.1%	51.9%	100.0%
Morfologi apherma	Count	60	57	117
	Expected Count	59.3	57.7	117.0
	% within Morfologi apherma	51.3%	48.7%	100.0%
Morfologi apherma	Count	73	71	144
	Expected Count	73.0	71.0	144.0
	% within Morfologi apherma	50.7%	49.3%	100.0%

Chi-Square Tests

	Value	df	Asymptotic Significance (2- sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)
Pearson Chi-Square	.086 ^a	1	.769	.833	.468
Continuity Correction ^b	.006	1	.936		
Likelihood Ratio	.086	1	.769		
Fisher's Exact Test					
Linear-by-Linear Association	.086	1	.770		
N of Valid Cases	144				

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 13,31.

b. Computed only for a 2x2 table

Risk Estimate

		95% Confidence Interval	
		Lower	Upper
Odds Ratio for Morfologi aperma (Normal / Abnormal)	.882	.382	2.038
For cohort Cleavage rate = Rendah	.939	.611	1.442
For cohort Cleavage rate = Normal	1.064	.708	1.601
N of Valid Cases	144		

Lampiran 5: Uji Normalitas Data

	Tests of Normality					
	Kolmogorov-Smirnov ^a			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Fertilisasi rate 2	.156	144	.000	.835	144	.000
Cleavage rate 2	.156	144	.000	.831	144	.000
Konsentrasi sperma 2	.138	144	.000	.901	144	.000
Motilitas 2	.152	144	.000	.929	144	.000
Morfologi 2	.206	144	.000	.879	144	.000

a. Lilliefors Significance Correction

Lampiran 6: Surat izin kaji etik



Kementerian Kesehatan
RSAB Harapan Kita

Jalan Let. Jend. S. Parman Kavling 87 Skip
Jakarta 11420
(021) 5668284
<http://www.rsabhk.co.id>

PERSETUJUAN ETIK (ETHICAL APPROVAL)
RSAB HARAPAN KITA
Nomor : IRB/39/06/ETIK/2024

Komite Etik Penelitian RSAB Harapan Kita telah mengkaji permohonan kelayakan etika penelitian yang diajukan oleh:

Nama Peneliti	: Gangsar Pariyanti
Judul Penelitian	: " Hubungan Kualitas Sperma Dengan Fertilization Rate Dan Cleavage Rate Pada Pasien Yang Mengikuti Program Bayi Tabung Di RSAB Harapan Kita".
Asal Instansi/ Unit Kerja	: Klinik IVP Melati RSAB Harapan Kita
Dengan Hasil	: Dapat disetujui pelaksanaannya

Komite Etik Penelitian atau IRB bertanggung jawab dalam memastikan perlindungan hak dan kesejahteraan subjek manusia yang berpartisipasi dalam uji klinis, sebagaimana didefinisikan Deklarasi Helsinki dan nasional dan peraturan lainnya yang relevan, dan untuk memberikan jaminan publik.

Demikian surat keterangan ini diberikan untuk dapat digunakan sebagaimana mestinya.

Jakarta, 19 Juni 2024
Ketua Tim Etik Penelitian RSAB Harapan Kita

dr. Setyadi Wi Luswati, SpA(K), PhD

UNIVERSITAS NASIONAL

*Keterangan Lulus kaji etik berlaku satu tahun dari tanggal persetujuan
**Peneliti berkewajiban:
1. Melakukan prosedur penelitian sesuai protokol yang telah disetujui kaji etik RSAB Harapan Kita
2. Memberitahukan status penelitian apabila:
a. Penelitian belum selesai, mengingat setahun dari ketenangan lulus kaji etik, maka keterangan kaji etik harus diperpanjang
b. Penelitian berakhir di tengah jalan
3. Melaporkan setiap kejadian tidak diinginkan
4. Peneliti tidak diperbolehkan melakukan tindakan apapun sebelum penelitian dinyatakan lulus kaji etik.



Lampiran 7: Surat izin penelitian



Kementerian Kesehatan
RSAB Harapan Kita
Jalan Let. Jend. S. Parman Kavling 87 Slipi
Jakarta 11620
Telp: 5668284
<http://www.rshkcsid.id>

NOTA DINAS
NOMOR: DP.04.03/D.XXII.2/637/2024

Yth : Kepala Instalasi Teknologi Reproduksi Berbantu
Dari : Pjt. Direktur SDM, Pendidikan dan Penelitian
Hal : Persetujuan Kegiatan Penelitian Gangsar Parlyanti
Tanggal : 6 September 2024

Sehubungan dengan persetujuan Etik dan Ketua Tim Etik Penelitian RSAB Harapan Kita nomor **IRB/39/06/ETIK/2024**, tentang Permohonan Izin Penelitian atas nama Gangsar Parlyanti dengan judul penelitian : **"Hubungan kualitas Sperma Dengan Fertilization Rate Dan Cleavage Rate Pada Pasien Yang Mengikuti Program Bayi Tabung Di RSAB Harapan Kita"** dengan ini kami sampaikan pada prinsip permohonan tersebut dapat disetujui untuk dilaksanakan dengan memenuhi persyaratan dan ketentuan sebagai berikut :

1. Mematuhi segala peraturan yang berlaku di RSAB Harapan Kita
2. Segala data, dokumen dan atau foto yang didapat, hanya digunakan untuk kepentingan penelitian ini, bila akan dipublikasikan harus mendapat izin dari Pimpinan RSAB Harapan Kita.
3. Setelah proses penelitian dan pengambilan data selesai dan hasilnya telah disetujui, peneliti wajib melaporkan kepada Tim Kerja Penelitian.
4. Pada akhir pelaksanaan kegiatan, peneliti wajib menyerahkan 1(satu) eksemplar laporan penelitian.

Atas perhatian dan kerja sama yang baik, diucapkan terima kasih.

Pjt. Direktur Sumber Daya Manusia, Pendidikan, dan Penelitian,



dr. Eva Devita Hamoniati, Sp.A(K)
NIP. 197703182014122002



Dokumen ini telah ditandatangani secara elektronik menggunakan sertifikat elektronik yang diterbitkan oleh Balai Sertifikasi Elektronik (BSnE), BSSN

41

Cek Turnitin Skripsi Gangsar Pariyanti.docx

ORIGINALITY REPORT

23%

SIMILARITY INDEX

22%

INTERNET SOURCES

9%

PUBLICATIONS

5%

STUDENT PAPERS

SIMILARITY SOURCES

1	fk.ui.ac.id	4%
2	journal.ugm.ac.id	3%
3	repo.unand.ac.id	1%
4	id.scribd.com	1%
5	journal.universitaspahlawan.ac.id	1%
6	repository.unair.ac.id	1%
7	Nurul Husniah Latifah, Eko Farida. "HUBUNGAN ANTARA STATUS GIZI, STRES, DAN KONSUMSI MINUMAN BERKAFEIN DENGAN PRIMARY DYSMENORRHEA PADA MAHASISWI UNIVERSITAS NEGERI SEMARANG", Jambura Journal of Health Sciences and Research, 2024	1%
8	text-id.123dok.com	1%
9	adoc.pub	1%
10	e-renggar.kemkes.go.id	