

Supplement File 2. Advanced analysis of selected questions on the management of elevated SDF

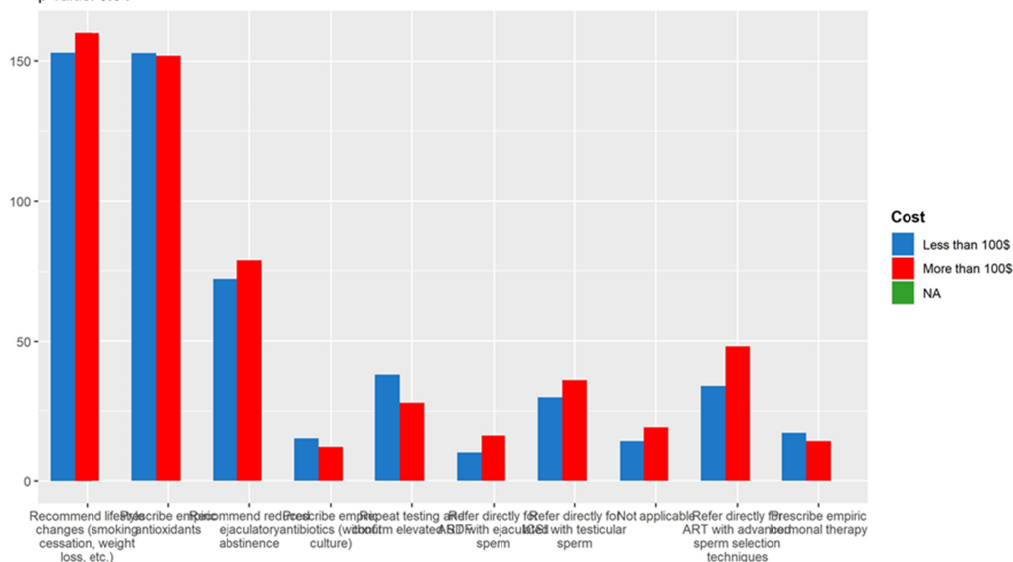
Q33: How do you treat elevated SDF once diagnosed in infertile men? [Select all that apply]

Advanced Analysis Question 33: To compare based on cost of SDF testing: less than \$100 vs. more than \$100, particularly “repeat testing and confirm elevated SDF”: (not significant)

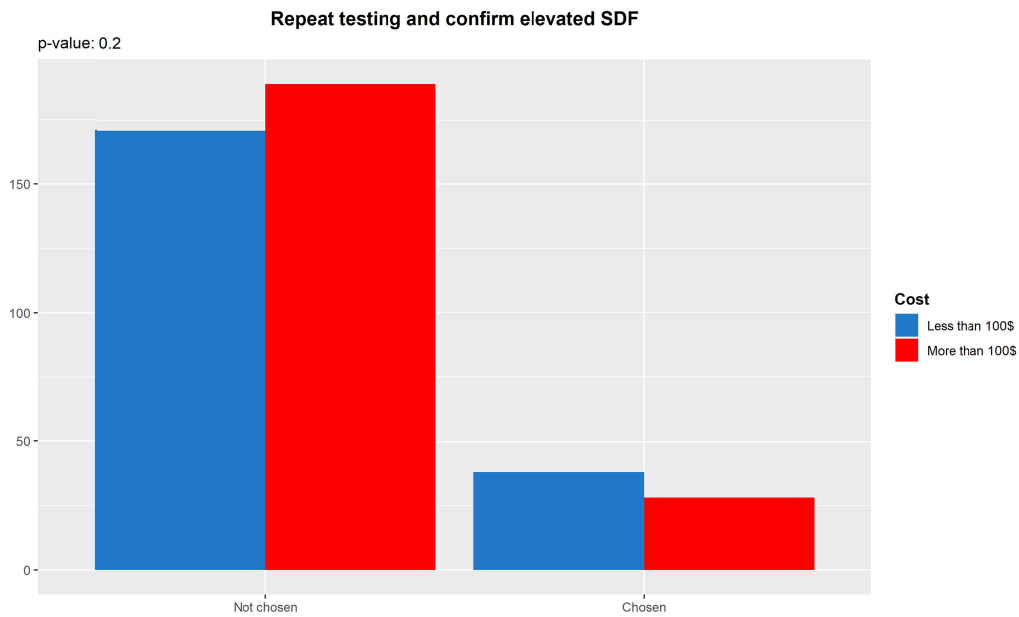
Cost	Less than 100\$	More than 100\$	p-value
How do you treat elevated SDF once diagnosed in infertile men? [Select all that apply] (Q 33)			0.6 F
Recommend lifestyle changes (smoking cessation, weight loss, etc.)	153 (28.54)	160 (28.37)	
Prescribe empiric antioxidants	153 (28.54)	152 (26.95)	
Recommend reduced ejaculatory abstinence	72 (13.43)	79 (14.01)	
Prescribe empiric antibiotics (without culture)	15 (2.8)	12 (2.13)	
Repeat testing and confirm elevated SDF	38 (7.09)	28 (4.96)	
Refer directly for ART with ejaculated sperm	10 (1.87)	16 (2.84)	
Refer directly for ICSI with testicular sperm	30 (5.6)	36 (6.38)	
Not applicable	14 (2.61)	19 (3.37)	
Refer directly for ART with advanced sperm selection techniques	34 (6.34)	48 (8.51)	
Prescribe empiric hormonal therapy	17 (3.17)	14 (2.48)	

How do you treat elevated SDF once diagnosed in infertile men? [Select all that apply] (Q 33)

p-value: 0.6 F



Cost	Less than 100\$	More than 100\$	p-value
Repeat testing and confirm elevated SDF			0.2
Not chosen	171 (81.82)	189 (87.1)	
Chosen	38 (18.18)	28 (12.9)	

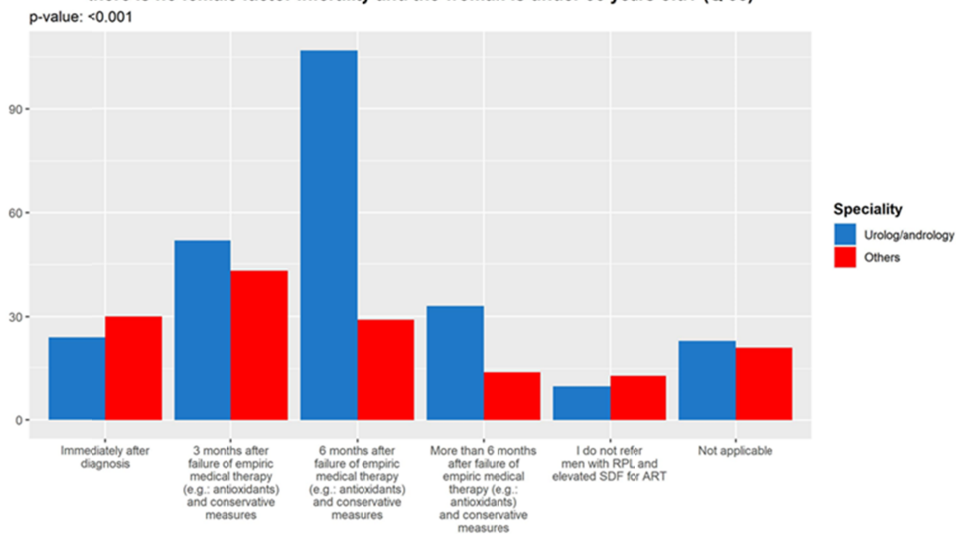


Q38: At which point would you refer a couple with natural RPL and high SDF in the man for ART, given there is no female factor infertility and the woman is under 35 years old?

Advanced Analysis Question 38: comparing the results between urologists/andrologists and other specialties: (significant!!)

Specialty	Urology/andrology	Others	p-value
At which point would you refer a couple with natural RPL and high SDF in the man for ART, given there is no female factor infertility and the woman is under 35 years old? (Q 38)			<0.001
Immediately after diagnosis	24 (9.64)	30 (20)	
3 months after failure of empiric medical therapy (e.g.: antioxidants) and conservative measures	52 (20.88)	43 (28.67)	
6 months after failure of empiric medical therapy (e.g.: antioxidants) and conservative measures	107 (42.97)	29 (19.33)	
More than 6 months after failure of empiric medical therapy (e.g.: antioxidants) and conservative measures	33 (13.25)	14 (9.33)	
I do not refer men with RPL and elevated SDF for ART	10 (4.02)	13 (8.67)	
Not applicable	23 (9.24)	21 (14)	

At which point would you refer a couple with natural RPL and high SDF in the man for ART, given there is no female factor infertility and the woman is under 35 years old? (Q 38)

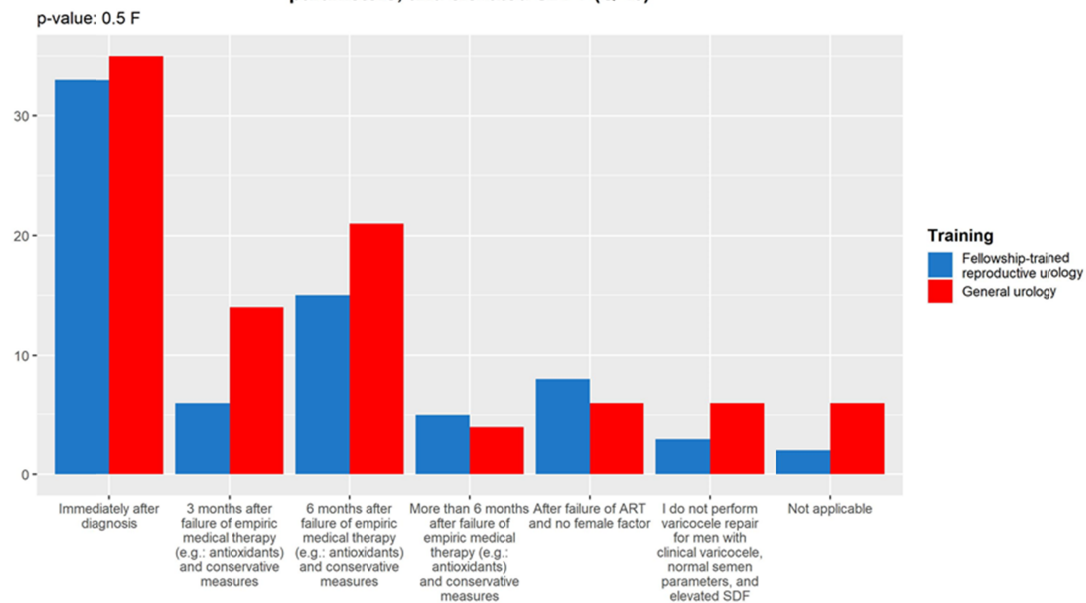


Q40: At which point do you perform varicocele repair for a man with clinical varicocele, normal semen parameters, and elevated SDF?

Advanced Analysis Question 40: comparing the results between fellowship-trained reproductive urologists and general urologists: (not significant)

Training	Fellowship-trained reproductive urology	General urology	p-value
At which point do you perform varicocele repair for a man with clinical varicocele, normal semen parameters, and elevated SDF? (Q 40)			0.5 F
Immediately after diagnosis	33 (45.83)	35 (38.04)	
3 months after failure of empiric medical therapy (e.g.: antioxidants) and conservative measures	6 (8.33)	14 (15.22)	
6 months after failure of empiric medical therapy (e.g.: antioxidants) and conservative measures	15 (20.83)	21 (22.83)	
More than 6 months after failure of empiric medical therapy (e.g.: antioxidants) and conservative measures	5 (6.94)	4 (4.35)	
After failure of ART and no female factor	8 (11.11)	6 (6.52)	
I do not perform varicocele repair for men with clinical varicocele, normal semen parameters, and elevated SDF	3 (4.17)	6 (6.52)	
Not applicable	2 (2.78)	6 (6.52)	

At which point do you perform varicocele repair for a man with clinical varicocele, normal semen parameters, and elevated SDF? (Q 40)

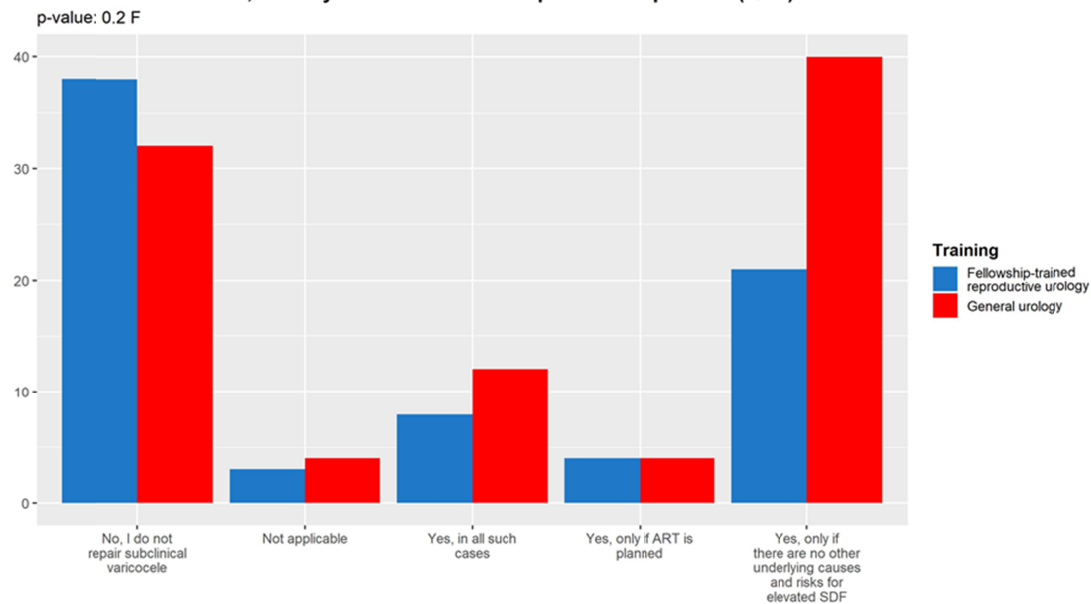


Q42: During the evaluation of an infertile man, he is found to have elevated SDF as well as subclinical varicocele, would you offer varicocele repair for this patient?

Advanced Analysis Question 42: comparing the results between fellowship-trained reproductive urologists and general urologists: (not significant)

Training	Fellowship-trained reproductive urology	General urology	p-value
During the evaluation of an infertile man, he is found to have elevated SDF as well as subclinical varicocele, would you offer varicocele repair for this patient? (Q 42)			0.2 F
No, I do not repair subclinical varicocele	38 (51.35)	32 (34.78)	
Not applicable	3 (4.05)	4 (4.35)	
Yes, in all such cases	8 (10.81)	12 (13.04)	
Yes, only if ART is planned	4 (5.41)	4 (4.35)	
Yes, only if there are no other underlying causes and risks for elevated SDF	21 (28.38)	40 (43.48)	

During the evaluation of an infertile man, he is found to have elevated SDF as well as subclinical varicocele, would you offer varicocele repair for this patient? (Q 42)

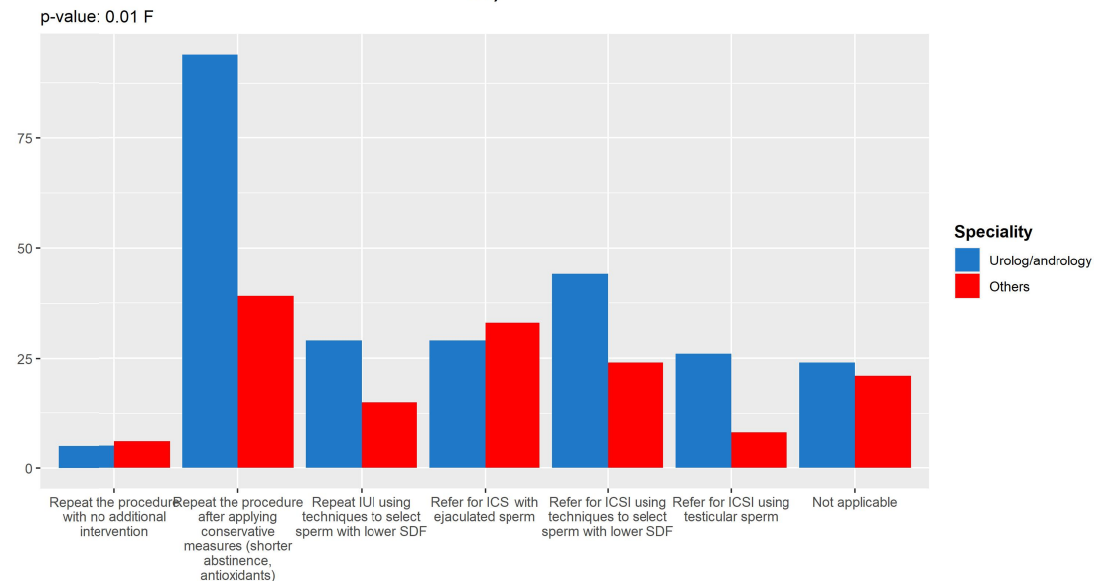


Q51: In a couple with a normal female partner experiencing failure to achieve a clinical pregnancy after IUI, associated with elevated SDF in the male partner, what would your management strategy be?

Advanced Analysis Question 51: comparing the results between urologists/andrologists and other specialties: (significant!!)

Speciality	Urology/ andrology	Others	p-value
In a couple with a normal female partner experiencing failure to achieve a clinical pregnancy after IUI, associated with elevated SDF in the male partner, what would your management strategy be? (Q 51)			0.01 F
Repeat the procedure with no additional intervention	5 (1.99)	6 (4.11)	
Repeat the procedure after applying conservative measures (shorter abstinence, antioxidants)	94 (37.45)	39 (26.71)	
Repeat IUI using techniques to select sperm with lower SDF	29 (11.55)	15 (10.27)	
Refer for ICSI with ejaculated sperm	29 (11.55)	33 (22.6)	
Refer for ICSI using techniques to select sperm with lower SDF	44 (17.53)	24 (16.44)	
Refer for ICSI using testicular sperm	26 (10.36)	8 (5.48)	
Not applicable	24 (9.56)	21 (14.38)	

In a couple with a normal female partner experiencing failure to achieve a clinical pregnancy after UI, associated with elevated SDF in the male partner, what would your management strategy be? (Q 51)



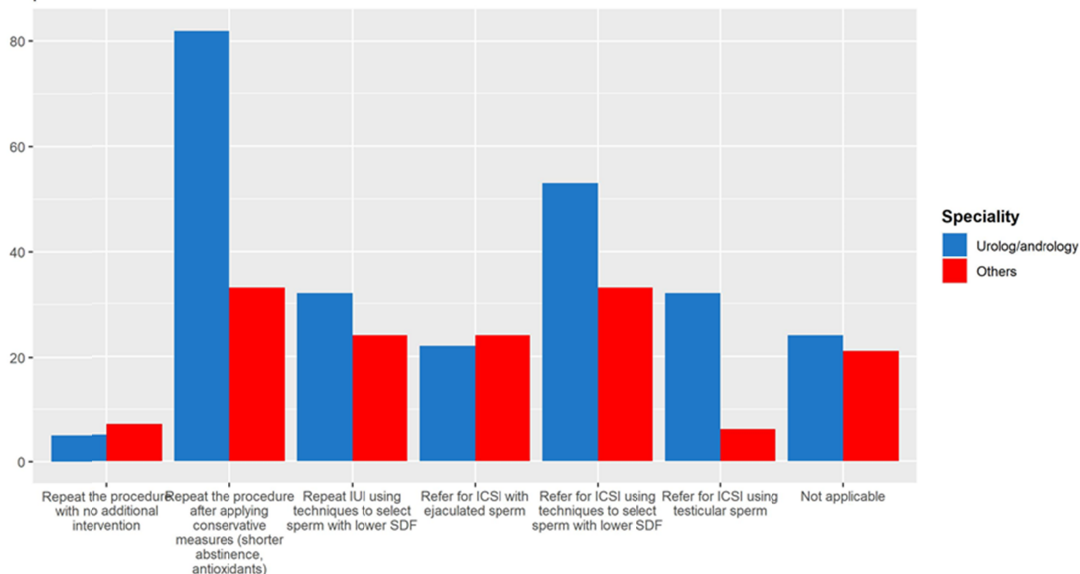
Q52: In a couple with a normal female partner experiencing miscarriage after IUI, associated with elevated SDF in the male partner, what would your management strategy be?

Advanced Analysis Question 52: comparing the results between urologists/andrologists and other specialties: (significant!!)

Specialty	Urology/ andrology	Others	p-value
In a couple with a normal female partner experiencing miscarriage after IUI, associated with elevated SDF in the male partner, what would your management strategy be? (Q 52)			0.001 F
Repeat the procedure with no additional intervention	5 (2)	7 (4.73)	
Repeat the procedure after applying conservative measures (shorter abstinence, antioxidants)	82 (32.8)	33 (22.3)	
Repeat IUI using techniques to select sperm with lower SDF	32 (12.8)	24 (16.22)	
Refer for ICSI with ejaculated sperm	22 (8.8)	24 (16.22)	
Refer for ICSI using techniques to select sperm with lower SDF	53 (21.2)	33 (22.3)	
Refer for ICSI using testicular sperm	32 (12.8)	6 (4.05)	
Not applicable	24 (9.6)	21 (14.19)	

In a couple with a normal female partner experiencing miscarriage after IUI, associated with elevated SDF in the male partner, what would your management strategy be? (Q 52)

p-value: 0.001 F



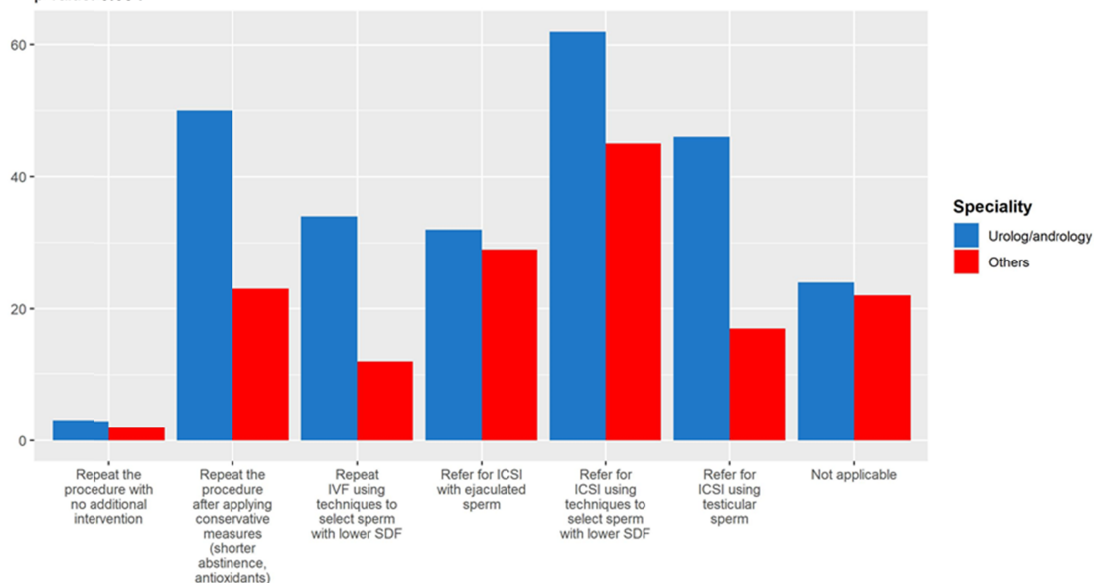
Q53: In a couple with a normal female partner experiencing fertilization failure after IVF, associated with elevated SDF in the male partner, what would your management strategy be?

Advanced Analysis Question 53: comparing the results between urologists/andrologists and other specialties: (not significant)

Speciality	Urology/ andrology	Others	p- value
In a couple with a normal female partner experiencing fertilization failure after IVF, associated with elevated SDF in the male partner, what would your management strategy be? (Q 53)			0.05 f
Repeat the procedure with no additional intervention	3 (1.2)	2 (1.33)	
Repeat the procedure after applying conservative measures (shorter abstinence, antioxidants)	50 (19.92)	23 (15.33)	
Repeat IVF using techniques to select sperm with lower SDF	34 (13.55)	12 (8)	
Refer for ICSI with ejaculated sperm	32 (12.75)	29 (19.33)	
Refer for ICSI using techniques to select sperm with lower SDF	62 (24.7)	45 (30)	
Refer for ICSI using testicular sperm	46 (18.33)	17 (11.33)	
Not applicable	24 (9.56)	22 (14.67)	

In a couple with a normal female partner experiencing fertilization failure after IVF, associated with elevated SDF in the male partner, what would your management strategy be? (Q 53)

p-value: 0.05 f

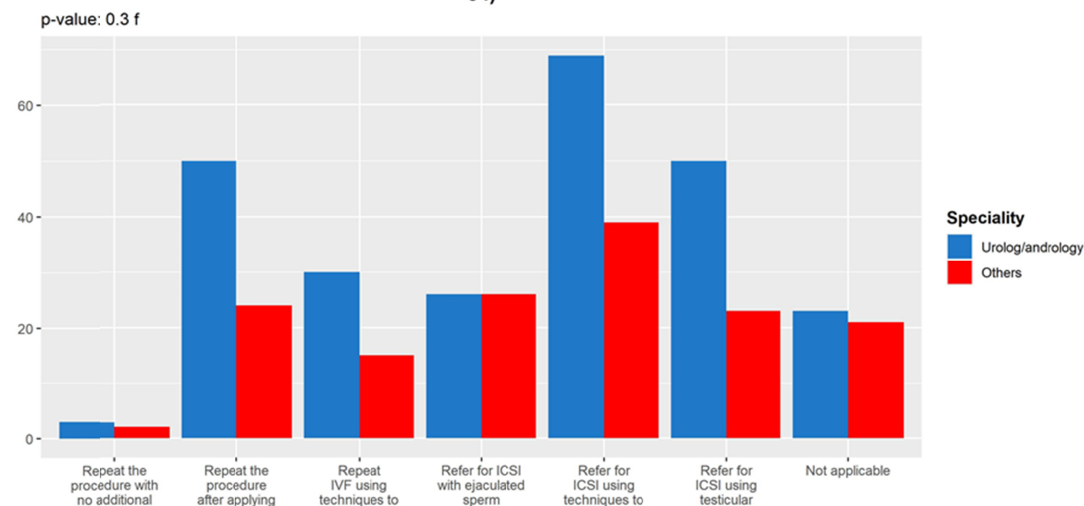


Q54: In a couple with a normal female partner experiencing failure to achieve a clinical pregnancy after IVF, associated with elevated SDF in the male partner, what would your management strategy be?

Advanced Analysis Question 54: comparing the results between urologists/andrologists and other specialties: (not significant)

Speciality	Urology/ andrology	Others	p-value
In a couple with a normal female partner experiencing failure to achieve a clinical pregnancy after IVF, associated with elevated SDF in the male partner, what would your management strategy be? (Q 54)			0.3 f
Repeat the procedure with no additional intervention	3 (1.2)	2 (1.33)	
Repeat the procedure after applying conservative measures (shorter abstinence, antioxidants)	50 (19.92)	24 (16)	
Repeat IVF using techniques to select sperm with lower SDF	30 (11.95)	15 (10)	
Refer for ICSI with ejaculated sperm	26 (10.36)	26 (17.33)	
Refer for ICSI using techniques to select sperm with lower SDF	69 (27.49)	39 (26)	
Refer for ICSI using testicular sperm	50 (19.92)	23 (15.33)	
Not applicable	23 (9.16)	21 (14)	

In a couple with a normal female partner experiencing failure to achieve a clinical pregnancy after IVF, associated with elevated SDF in the male partner, what would your management strategy be? (Q 54)



Q55: In a couple with a normal female partner experiencing miscarriage after IVF or ICSI, associated with elevated SDF in the male partner and no other abnormality, what would your management strategy be?

Advanced Analysis Question 54: comparing the results between urologists/andrologists and other specialties: (not significant)

Specialty	Urology/ andrology	Others	p- value
In a couple with a normal female partner experiencing miscarriage after IVF or ICSI, associated with elevated SDF in the male partner and no other abnormality, what would your management strategy be? (Q 55)			0.05 F
Repeat the procedure with no additional intervention	5 (1.99)	6 (4.03)	
Repeat the procedure after applying conservative measures (shorter abstinence, antioxidants)	58 (23.11)	34 (22.82)	
Repeat IVF or ICSI using techniques to select sperm with lower SDF	74 (29.48)	54 (36.24)	
Refer for ICSI using testicular sperm	86 (34.26)	32 (21.48)	
Transfer to another center	4 (1.59)	1 (0.67)	
Not applicable	24 (9.56)	22 (14.77)	

In a couple with a normal female partner experiencing miscarriage after IVF or ICSI, associated with elevated SDF in the male partner and no other abnormality, what would your management strategy be? (Q 55)

p-value: 0.05 F

