Supplementary Materials

Table S1. Values of qualitative and quantitative parameters of the II sperm fraction samples collected from dogs in control group II (positive control- untreated animals with BPH) (n = 3*). Results presented as mean ± SD

	II fraction volume (ml)	**Concentration (x10⁶/ml)**	**Total sperm count (x10⁶)**	**Motility (%)**	**Progressive motility (%)**	**Defects (%)**	**Live sperm (%)**
D0	2.4	404.3	969.2	97.7	55.3	18.5	98
n=3	±1.3	±19.5	±473.5	±0.6	±17.2	±1.3	±0
D7	2.8	121.5	396.9	92	55.3	12.2	97.7
n=3	±0.9	±95.6	±401.2	±9.54	±11.7	±7.4	±1.3
D14	2.6	175.5	361.0	92.3	54.67	20.7	97.2
n=3	±1.4	±100.7	±61.6	±4.5	±30.9	±13.0	±1.8
D21	1.9	19.3	45.8	62	47	12	99.5
n=3	±1.3	±14.5	±52.0	±4.2	±7.1	±2.1	±0
W+8	1.2	71.5	109.5	93.5	51	36.4	95.75
n=3	±1.2	±27.6	±90.4	±5.0	±25.5	±3.9	±3.9
W+12	1.4	118.5	227.4	73	3	25	89
n=3	±0.9	±144.5	±303	±21.2	±4.2	±1.4	±7.1
W+16	2.5	209.0	522.5	95.5	67	29.5	96.5
n=3	±0	±101.1	±252.7	±2.1	±14.14	±22.6	±0.7
W+20	1.7	191.3	426.5	82	55.7	24.7	95.3
n=3	±0.8	±203.4	±515.4	±16.5	±19.7	±7.3	±2.3

** only the descriptive statistics were used due to problems with obtaining ejaculates, and thus a small number of samples*

Table S2. Characteristic of sperm motility in the II sperm fraction samples collected from dogs in control group II (positive control- untreated animals with BPH) (n = 3, due to BPH related problems in obtaining semen in some individuals). Results presented as mean ± SD*

	VAP	**VSL**	**VCL**	**ALH**	**BCF**	**STR**	**LIN**	**RAPID**	**STATIC**
D0	138.4	119.4	196.4	6.5	30.9	85	61	67.7	2.33
n=3	±28.3	±24.3	±29.7	±1.1	±1.5	±2	±5.7	±23.3	±0.6
D7	151.3	133.1	231.7	8.4	30.5	87	58.	63	8
n=3	±32.0	±29.4	±51.4	±2.5	±2.3	±1.5	±4.2	±14.2	±9.5
D14	135.1	117.2	195.8	7.5	27.3	85	59	61	7.7
n=3	±53.5	±50.7	±66.6	±1.4	±6.6	±8.1	±14.5	±34.9	±4.5
D21	167.4	159.4	219.7	7.2	33.8	94	72	49	38
n=3	±4.0	±1.4	±17.5	±1.6	±6.7	±0	±2.8	±7.1	±4.2
W+8	134.3	118.6	198.5	8.0	32.1	86	50	58	6.5
n=3	±31.3	±33.2	±4.4	±3.0	±1.5	±4.2	±31.8	±29.7	±5.0
W+12	69.4	61.7	110.3	2.5	27.8	86	54	3	27
n=3	±23.5	±26.4	±15.3	±3.5	±14.4	±6.4	±14.1	±4.2	±21.2
W+16	159.7	145.6	211	6.9	34.0	90	69	74.5	4.5
n=3	±6.5	±9.2	±5.4	±0.7	±0.8	±2.8	±7.1	±4.5	±2.1
W+20	138.0	125.8	200.0	7.3	30.6	91	63	60.3	18
n=3	±31.6	±28.6	±37.2	±0.6	±7.1	±1.5	±2.5	±22.9	±16.5