

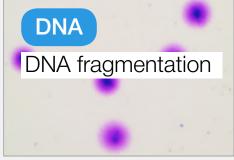
Sperm AnalysisAutomatic Systems for Sperm Analysis





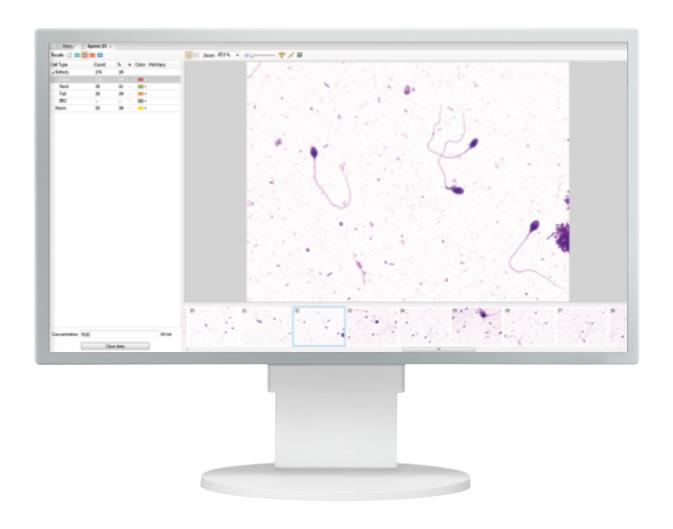






Vision Sperm

Automatic Systems for Sperm Analysis



Artificial intelligence



Artificial intelligence (AI) cumulates algorithms and technologies that allow computers to learn and solve intellectual tasks provided by humans.

Al speeds up processing and interpretation of data, and allows to efficiently perform the most comprehensive tasks, including medical image analysis.

Clinical applications



The latest developments of artificial intelligence provide a solution for the tasks connected with automation in digital microscopy.

Our technologies speed up the diagnostic process, reduce analysis time and lower subjectivity of the results received.

They improve the efficiency of laboratory routine operation, bringing microscopy analyses in line with state-of-the-art standards.

Analysis of sperm parameters according to WHO requirements



Motility / Concentration



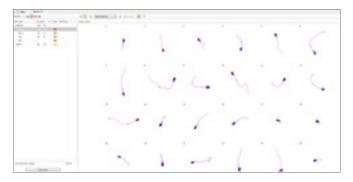
Motility analysis and sperm concentration assessment.

Motility is determined by computing the sperm cells moving path in the field of view during a set time period.

Concentration is determined by calculating the total number of spermatozoa taking into account the specimen's thickness and dilution.



Morphology



Morphology analysis of sperm, identification and pre-classification. Sperm cells are classified as "normal" and "abnormal".

Types of defects:

- Head;
- Neck;
- Tail;
- ERC.



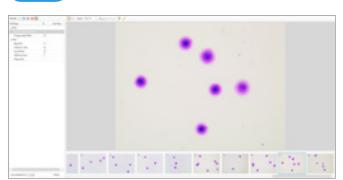
Vitality



Pre-classification of sperm vitality, calculation of live-dead ratio.



DNA fragmentation

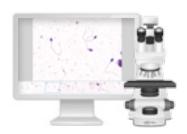


Pre-classification by DNA fragmentation degree.

Calculation of the ratio of fragmented spermatozoa to relatively healthy ones.

Telemedicine and remote consultations with collegues.

Specifications



Vision Basic **Cell Imaging Analyzer**



Vision Assist **Cell Imaging Analyzer**

Application module: Vision Sperm	Application module: Vision Sperm
Manual scanning	Automatic scanning
1 slide	1 slide
Manual slide handling	Manual slide handling
Manual oil dispensing	Manual oil dispensing
Manual slide identification	Manual slide identification
Microscope	Scanning Microscope
Monitor	Monitor
Personal computer	Personal computer
Optical system: 10x, 20x, 40x, 100x Oil	Optical system: 10x, 20x, 40x, 100x Oil
Bright fields, phase contrast	Bright fields, phase contrast
Köehler, LED	Köehler, LED
Bidirectional LIS, LIS2-A2 (ASTM), HL7, Ethernet	Bidirectional LIS, LIS2-A2 (ASTM), HL7, Ethernet

Art. N.: 64030.04	Art. N.: 71150.04

Product only for research. We reserve the right to change specification without notice.

