

# SQA-V Sperm Quality Analyzer

*Automated  
Semen Analysis  
in less than  
2 minutes*

**T**he SQA-V is an analytical medical device that performs a complete quantitative evaluation of semen quality and semen parameters in **less than 2 minutes**. This high performance analyzer incorporates technology in electro-optics, computer algorithms and video microscopy to provide a quick, precise and accurate automated semen analysis that is unmatched by manual methods.

## Features

- Runs fresh, frozen and washed semen
- Disposable testing capillary
- Requires no sample dilution
- FDA and CE certified
- QC: Self testing, self calibrating. Runs latex beads or stabilized sperm
- Visualization system (x300 & x500)
- PC compatible
- V-Sperm™ software included



## Automated Test Results

Total Sperm Concentration  
% Motility  
% Progressive Motility  
% Immotility  
% Normal Morphology  
Motile Sperm Concentration  
Progressively Motile Sperm Concentration  
Functional Sperm Concentration  
Average Velocity  
Sperm Motility Index



Medical Electronic Systems

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## Performance Claims

### Specificity

Concentration: 85%  
Motility: 80%  
Calculated Normal Morphology (WHO): 65%  
High Sensitivity/Postvasectomy: 95% of motile cells detected

### Sensitivity

Concentration: 90%  
Motility: 85%  
Calculated Normal Morphology (WHO): 85%

### Correlation to Manual Method

Concentration: 0.9  
Motility: 0.85  
Calculated Normal Morphology (WHO): 0.65

**Concentration:** Millions of sperm cells are analyzed: A very specific wavelength of light is absorbed by the sperm cells in the concentration chamber of the SQA-V testing capillary. An optical density detector measures the light absorbed by the cells. This is translated into cell concentration by a microprocessor based on a proprietary MES algorithm.

**Motility:** Tens of thousands of sperm cells are analyzed as they move through a light source in the SQA-V: The movement of motile sperm causes light disturbances. These light disturbances are converted into electronic signals with "peaks and valleys." These electronic signal peaks are analyzed by a microprocessor and translated into motility based on a proprietary MES algorithm.

**Normal Morphology:** This is a calculated parameter based on a correlation between sperm motility and morphology. MES developed a proprietary algorithm that expresses NORMAL morphology as it relates to motility, progressive motility, and velocity. This parameter is useful as a qualitative indicator of normal vs. abnormal morphology.



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