

Simple Microscope (1 lens)



~ 20 magnification

Antonie Von Leeuwenhoek



first to see living cells

Leeuwenhoek's Simple Microscope (1 lens)

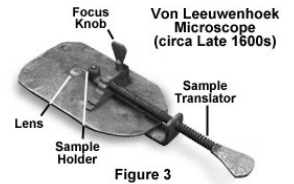
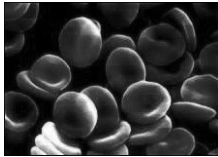


Figure 3

Leeuwenhoek looked at red blood cells



He also looked at bacteria



This is his drawing of sperm.

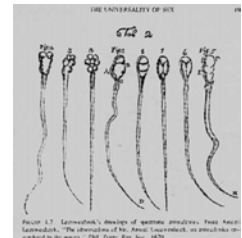


Figure 1.1 Leeuwenhoek's drawings of sperm animals. From Antoni Leeuwenhoek, "The observations of Mr. Antoni Leeuwenhoek, on several things imparted to the senses," Phil. Trans. Roy. Soc. 1677

Robert Hooke - 1st Compound Scope



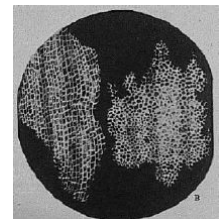
first to see cells (but they were dead)

Hooke's Compound Microscope (2 lenses)

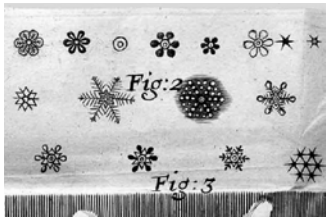


Figure 1

Drawing of Cork Cells by Hooke



Snowflakes by Hooke



Fly drawing by Hooke

Modern Light Microscope



~1,500 magnification

Scanning Electron Microscopes (SEM)

~60,000 magnification



Scanning Tunneling Microscope (STM)



~1,000,000 magnification

Transmission Electron Microscope (TEM)

~2,000,000 magnification



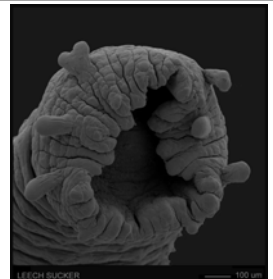
The latest in transmission electron microscopes.

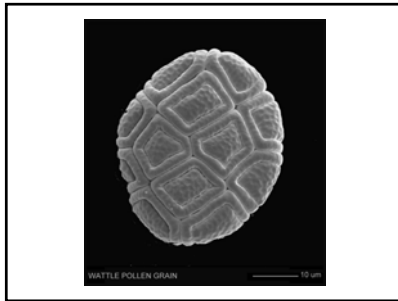
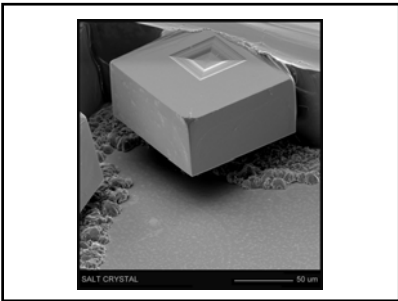
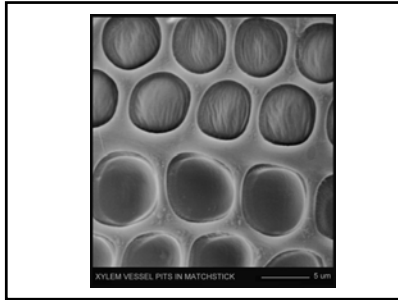
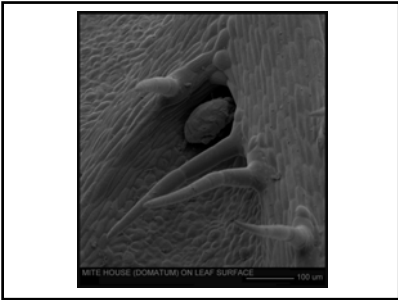


A woman standing inside the microscope.

Picture Gallery

(using a scanning or tunneling electron microscope)





The End