

Name _____
Period _____
Date _____

The Scientific Method: Sore Throat Problem

One day a student woke up with a terrible sore throat. It hurt all day, so after school his mother took him to the doctor. When the doctor came in to examine him, he told the doctor that he had a sore throat. The doctor asked the student to tell her when the sore throat began and how it feels now. Then she checked his throat and took his temperature. Based on her experience, the doctor thought that the student might have strep throat.

The doctor took a throat culture from the student and gently rubbed it on a growth medium in a petri dish. The doctor also had a sample of the organism that causes strep throat, which she rubbed on a second petri dish. The doctor then sent the two petri dishes to her lab. A few hours later a lab technician contacted the doctor and told her that the experimental dish showed that the sore throat was caused by another kind of bacterium, rather than the one that causes strep throat.

The doctor then contacted the student's mother and told her that her son did not have strep throat, but that it was a bacterial infection and that she would prescribe an antibiotic. The doctor also contacted other doctors in the area to find out whether they had noticed any trend in sore throats being caused by a new bacterium

1. What is the problem in the story?
2. How did the doctor gather information before making her hypothesis?
3. What was the doctor's hypothesis?
4. How did the doctor test her hypothesis?
5. What was the control group?
6. What was the experimental group?
7. What was the variable?
8. What results did the doctor obtain?
9. What was the doctor's conclusion?
10. How did the doctor communicate her results?

