

### CALIFORNIA STATE SCIENCE FAIR 2002 PROJECT SUMMARY

Name(s)

**Crystal R. Hucko** 

# Project Number S1313

#### **Project Title**

## The Detection of Tenia pedis within the Tracy Community Area

#### **Objectives/Goals**

Abstract

The main focus of this experiment was to examine was how prominent the fungus, Tenia pedis, is throughout the communal bathing areas around Tracy, California.

#### Methods/Materials

This was accomplished by gathering samples from Tracy and West High Schools# locker rooms in Tracy, California. The samples were obtained by running a moistened cotton swab across a possibly infected area and culturing these samples on a Dermatophyte Test Medium. These samples were monitored during growth over a period of two weeks.

#### Results

Of the seventeen samples taken only one culture proved to test positively for the fungus. This was sample gathered from shower #4 of the Tracy High Boys# locker room. The growth of a white, fluffy hyphae mycelium occurred, while it also produced alkaline causing a change in medium color, from yellow to red. While other dermatophyte growth did appear on the test mediums, it was not the growth of Tenia pedis.

#### **Conclusions/Discussion**

This study was completed in order to insure that public showers throughout the Tracy community are not harmful to the many people who use them after swimming, working out, playing sports, and other physical activity. The results produced provided helpful information which can be used to ensure that the Tracy High Boys# facilities are cleaned more properly.

#### **Summary Statement**

My project is about testing for the presence of Tenia pedis (athlete's foot) within Tracy, California.

#### **Help Received**

Mr. Brown helped in direction of how to create backboard, Lawrence Livermore National Laboratory printed out the backboard for me, and Hardy Diagnostic Co. provided the test medium.