A Quantitative Analysis of the Presence and Absence of a Variety of Mold Groups

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PURPOSE: To determine how temperature, humidity, and wind speed affect what groups of mold grow PROCEDURE:A. (1) Collect air quality samples from 10 locations (2) collect data to represent the current weather conditions (3) incubate the samples at 23 degrees Celsius for 48 hours (4) took pictures of every plate (5) refrigerate samples (6) repeat this process 3 times B. (1) Aseptically, place a sheet of sterile filter paper in a petri dish (2) Place a sterile U-shaped glass rod on the filter paper (3)pour sterile water on filter paper (4) place a sterile slide on the U-shaped rod (5) sterilize scalpel, cut a 5 mm square block of medium (6) pick up the block of agar and transfer it to the center of the slide (7) sterilize inoculating lubes, inoculate four sides of the agar square with spores of the fungus to be examined (8) aseptically, place a sterile cover glass on the agar cube (9) place the cover on the petri dish, incubate at room temperature for 48 hours. C. (1) place a drop of lactophenol cotton blue stain on a clean microscope slide (2) remove the cover glass from the slide culture, discard block of agar (3) add a drop of 95% ethanol to the hyphae. Place the cover glass, mold side down, on the drop of lactophenol cotton blue on the slide. Examine under microscope. CONCLUSION: I found higher humidity, wind speed, and temperatures to support the growth of more diverse mold groups

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