Tue, 27 Mar 2007 Ballooning in 28 Knot Winds...

....is impossible, so we didn¹t do it. But since plans were suddenly made nebulous this morning due to some impending bad weather, I introduced myself to Jim Thompson, the balloon pilot / thermography expert / caver and glommed onto his small team heading to Pisgah crater to explore some lava tubes (of which the crater/cone and surrounding area holds over 300) and take pictures of the entrances with his fancy FLIR imager until winds picked up enough to literally blow us around, not to mention the equipment. The idea is that with thermography, one could detect entrances to lava tubes more easily, or at least could remotely sense what is difficult or impossible to do in person. Later in the week, if weather is good, then the balloon will be tethered near the rim of the crater to see lava tubes in all directions from the air. The applications for coming up with thermal Œfingerprints<sup>1</sup> for various types of caves from a remote arial platform has clear applications on Mars, given recent research suggesting that lava tubes are plentiful. I was excited to hear Dr. Penny Boston talking about a pet idea of developing foam-in airlocks for caves as already existant habitats for humans on Mars during a presentation last night, and the myriad other connections between the various projects (study of soil, cyanobacteria, robotics) coalesced tonight while the lead scientists for each project had an animated conversation synthesizing research and spawning new directions in the roomful of Spaceward Bound teachers after dinner.

-Dan Ruby