## RTG Seminar September 11, 2006

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I guess this room might work after all. It's not quite twenty after. I wanted to start by passing out questionnaires for the students. I'd like to have profiles of the students who are really interested in the RTG program. I'm not planning on doing anything today, except for the organizational. While you're filling this out, let me say what I envision for this seminar. The material will change a lot from week to week. The main idea is that we'll begin for the first hour with some sort of lecture. Then we'll break and come back and have a brainstorming session, questions, spinoffs. With any luck at the end we'll have things to look up, and then we'll begin the next week with anything that amounts to an answer and then we'll start all over again. That's the idea of the format. Will pick some topics with the RTG instructors. The idea will be that there will be some sort of discussion that is purely mathematical, and then a later discussion from a physical point of view. There might be an algebraic discussion of spinors.

Maybe we should move to P-131. I sent out to all graduate students about a month ago a list of the kinds of topics we might be doing. Hi, Martin. If you don't know, this is Martin Rocek, who runs the string workshop. So let me say again that the plan will be that topics will be presented, and after that a break and I want a discussion. I want you not just to listen but also to talk.

[Denny: How long will it run?]

In principle until five.

[Oh my god!]

I want a meeting with the postdocs and interested faculty to hash out the first month or so of the program. I don't know what the first topic is going to be. I want to make an effort for the students who are really interested and are not terminal to get both a physics and a math advisor. We want people going to the algebraic geometry and physics seminar, to Dennis' course as much as possible.

[Martin: And the friday seminars, which are given by graduate students prepared under the supervision of a faculty member, on advanced topics, often involving math physics ideas.]

This is truly a great opportunity, after all this is a learning seminar.

[We've had talks on knot invariants that would have been completely accessible to math students. This Friday we'll have a meeting to discuss what we might be talking about. If you want to talk about something of interest that's great.]

[Dennis: What is the goal?]

The goal in particular is to go through a number of topics from the math and physics point of view, and to try to bring them together. It's not just to learn the subjects but how to change languages, secondary terminology.

[Dusa: Is the next semester also going to be at the same time?]

That would be nice, for stability.

[Denny: Why is it so long?]

It's a one-hour lecture, a break, and a discussion. The idea is to make it more lively. Are there any other questions? I'll put all graduate students on the mailing list but I want the questionnaires. I want to meet with each graduate student individually over the course of the semester. If you can just pass the questionnaires in, that's it for today.