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Letter from Henry Rowland to Albert Michelson about the construction of a grating.

Johns Hopkins University
Baltimore, Jan. 28th 1883

My Dear Prof. Michelson,

I should be most happy to make you a grating but I am afraid there are many ahead of you. The machine works slowly (only 20 000. lines per day) and the last diamond took me two months to set. But I would rather have an American do this work than a foreigner. The complete apparatus to work with a concave grating will be about as follows.

Concave grating (A1) on 6 in. circle having about 80 000 lines \$150.

Automatic apparatus including slit, photographic camera & eyepiece but no micrometer about 200.

Fitting up room 100.

You will need a large room. Min is 21 x 35 ft.

The next size is on a 4 in. circle and have about 45000 lines. The flat ones will show more than anybody has ever seen before but need a pair of telescopes of 3 in. diam. of objective. These cost about \$50. Anything smaller than these we do not trouble ourselves with at present.

Yours truly

Henry A. Rowland