is no hint of lunar atmospheric obscurations when Messrs. Wilkins and Moore ob served. Is it possible, then, that the appearance changed considerably betwee the two observations? We wish in vain that we had an observation simultaneou with Cragg's by a giant American telescope!

ARISTARCHUS

by H. P. Wilkins, F.R.A.S.

Aristarchus, being the brightest of all lunar formations and situated nea one of the most remarkable contorted valleys, has received much attention fro selenographers. In recent years attention has been more especially directed t the dusky bands which traverse the otherwise brilliant inner east slope. Num erous drawings have been published, chiefly as the result of observations wit comparatively small telescopes. Naturally observers differ in their interpre tation and delineation of the more delicate details.

The writer and Mr. P. A. Moore recently had the great privilege of observ ing this formation with an instrument of such impressive size and superlativ optical quality as the 33-inch Meudon refractor. On April 7, 1952, after som early interference from cirro-stratus cloud, the sky cleared; and a steady perio of very good definition ensued. The colongitude was 64°.9 so that the greate portion of the interior was illuminated. As seen with powers of 320X and 460X the most minute details were clear and sharply defined and are shown on the ac companying drawing, Figure 2 on pg. 96, which represents all the detail visibl on that occasion. I made the drawing of Aristarchus while Mr. Moore concentrate on the great valley to the north.

I very distinctly saw a crater-row under the southeast crest of the wall an two craters on the southwest, one of which appeared as a ring of light in th shadow of the west wall. Between these craters is the relic of an ancient ring The brilliant central mountain contrasted strongly with the somewhat dusky floo on which there were some lighter patches; undoubtedly low mounds and ridges. Th long and narrow central mountain is slightly constricted in the center, and ther is a very minute summit pit or craterlet. Four dusky bands were noted on the in ner east slope, positions and extent as shown. The most southerly was by fa the broadest and was traced across the floor to the central mountain. This ban certainly, and probably the others as well, was clearly seen to be composed of series of dark dots and dashes and not to be of uniform shade as usually depict ed. Antoniadi, using the same instrument, found a similar appearance in connec tion with the Martian "canals".

The northern inner slope was broken up into separate masses, which wer noted as intruding upon the floor and were strongly suggestive of the creepin of once plastic material. The west wall is precipitous in places near the cres with a lofty terrace on the inner slope, a portion of which protruded from th shadow; the inner east slope was also terraced, as shown.

Many of the features mentioned have not been recorded before and are to delicate for ordinary telescopes. The mass of delicate detail recorded on th numerous drawings I made of various formations during three nights of observa tion testify to the value of a large aperture, and I wish to acknowledge my in debtedness to the Observatory Director for kindly placing the third largest re fracting telescope in the world at my disposal.

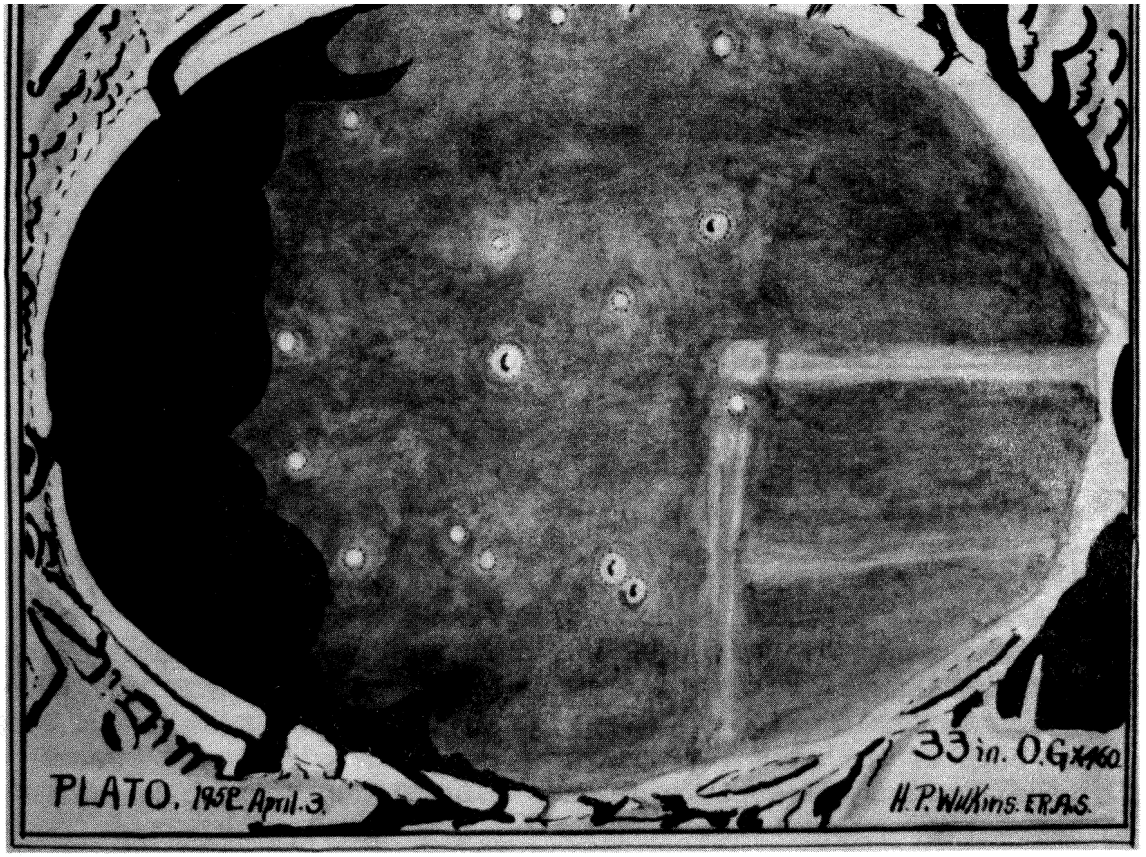

Figure 1. Drawing of Plato by H. P. Wilkins. 33-inch refractor, 460X. April 3, 1952. Colongitude near 16°.

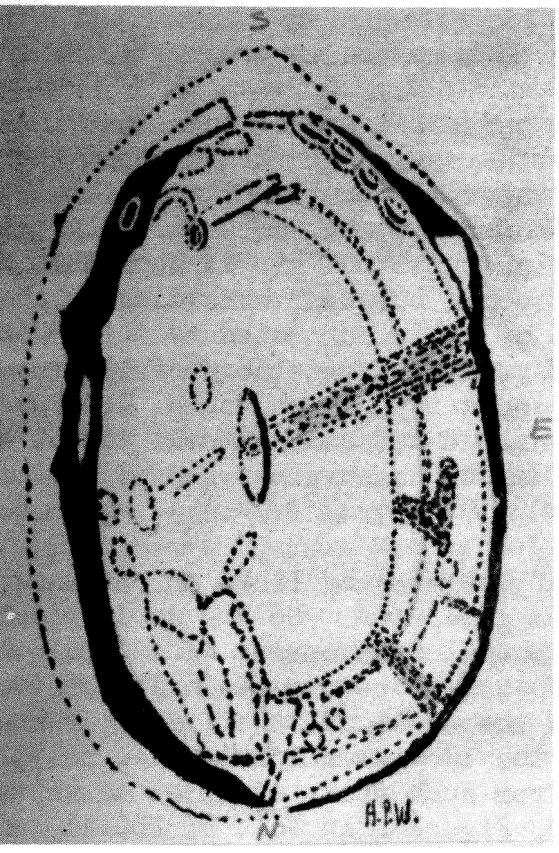

Figure 2. Aristarchus H. P. Wilkins. 33-inch refr. 320X

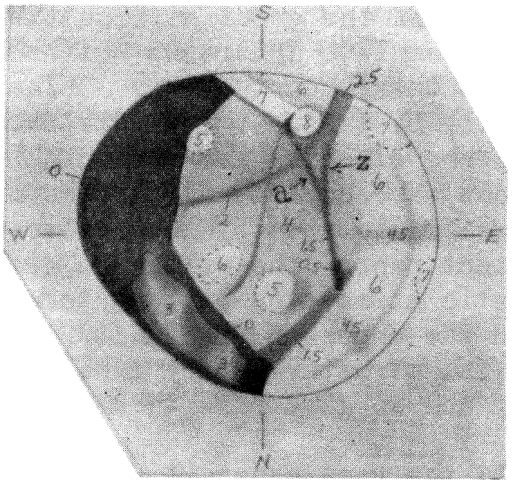

Figure 3. Conon
E. J. Reese. 6-inch refl. 240X.
May 4, 1952. 2^h0^m, UT
Colong. = 24°7

Remarks by Editor. The resolution of a dark band on the east inner wall in to dots and dashes is indeed decisive evidence of the optical superiority of 33-inch telescope. Walter H. Haas never obtained such a resolution in many view of Aristarchus with an 18-inch refractor in 1941-6. However, E. E. Hare partially resolved one dark wall band with a 12-inch reflector on September 24, 195 (The Strolling Astronomer, Volume 5, drawing in No. 8, pg. 1, test in No. 3, pp 11-12, 1951). The complex nature of the Aristarchus bands revealed by the Meudon refractor must certainly be considered in any explanation of them.

SIMILARITIES AND DIFFERENCES BETWEEN THE FESTOON SYSTEMS OF SATURN AND JUPITER

by James C. Bartlett, Jr.

In April and May of 1952 the writer observed rather marked festoon activi in the north hemisphere of Saturn, which appeared to be generally more acti than the south hemisphere. This was shown not only by the persistence of th festoon systems but by the frequent appearance of small humps and dark spots a long either edge of the N.E.B., by changes in the width of intensity of th N.E.B., by the occasional appearance of white spots and by the varying visi bility of the N.T.B. and the N.N.T.B.

In this paper it is proposed to make a brief comparison of the Saturnia to the Jovian festoon systems. Saturnian festoons are naturally more difficul to see than their Jovian analogues, in consequence whereof considerably greate uncertainty enters into the observations; and in view of the small aperture use by the writer - 3.5-inches - some may consider that the phenomena discussed be low should be referred to psychiatry rather than astronomy, but I leave this the judgement of my peers.

A few preliminary remarks about festoons as such may be in order.

One of the great difficulties attending our understanding of these markin is our complete ignorance of their nature and perhaps we know better what th are not than what they are. That they are not material structures is indicat not only by the vast real distances between their termini, but especially by t peculiar, elastic property which they occasionally exhibit. This is such that festoon may shorten and thicken, or lengthen and become thinner, according to t necessity dictated by the differential movements of belts connected by them. a recent paper[1] the writer suggested that they may be manifestations of electr magnetic attraction between termini of opposite polarity, which would well e plain the apparent elasticity. In this view, while the festoon itself is not material structure, very finely divided matter may be constrained to follow t flux, and so give rise to a visible line.

In the same paper it was remarked that one of the missing links in our kno ledge of festoons is the manner in which they are generated. So far as is kno to me, no observation has yet been made of the actual development of a festo from point of origin to terminus though what appears to be the beginning of t process has been observed many times. I refer to the development of small, dar round, or oval spots along the outer edges of the Jovian and Saturnian belt Occasionally short wisps are observed to arise from such spots, examples of whi may be seen in Saheki's fine drawing of Jupiter, Figure 4 in Vol. 5, No. 11 The Strolling Astronomer. It is virtually certain that by extension these wis