

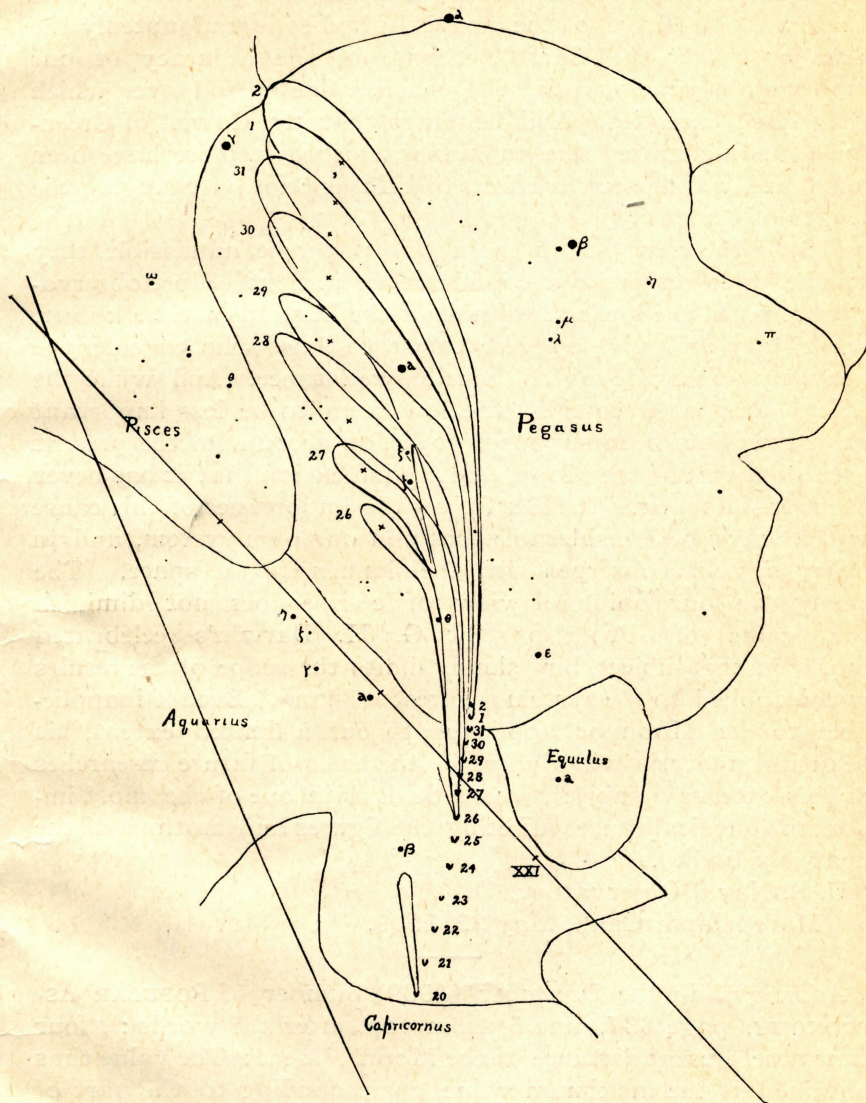
## DRAWINGS OF COMET a 1910.

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The accompanying drawings show the extraordinary development of the tail of the comet recently visible in the western sky



COMET a 1910

after sunset. The comet was first seen here about a half hour after sunset on January 20th, and has been seen nearly every



night since then. At first its tail was straight and narrow and some  $6^\circ$  or  $8^\circ$  long. After the clouds of the 23rd had cleared away, it showed a slight curvature and rapidly increased in length till on the 26th it was some  $24^\circ$  long. On this date a southern branch was evident, a feature of peculiar interest, for it did not appear to be a separate tail starting from the head, with a stronger curve, but it looked distinctly like a branch from the main tail at a distance of  $16^\circ$  from the head. This character was noticed independently by many persons, even as late as February 1, when the sharpness of the bend at the point of joining the straighter tail was much less apparent. Moreover this branch showed an increased condensation at about its apparent center in the form of a very diffused mass of cometary matter. In the diagram the outline of this branch is given with its date and the position of the brighter center is marked with an X.

As first seen the nucleus appeared about one-eighth of the diameter of Venus, with a brilliant coma pushed well out ahead of it. In the course of ten days the coma disappeared and the whole comet grew fainter as it receded from the Sun, and the tail, while becoming fainter, increased vastly in size until on February 3rd it had the enormous length of  $45^\circ$ . Every estimate of length has been corroborated by several observers. The chief difficulty has been the interference of the zodiacal light in which the fainter tail disappears. The following table gives the rough positions obtained with the eight-inch Harvard telescope loaned to this University. They were made by setting off distances in R. A. and Decl. from Venus:

1910	G. M. T.	R.A. and Decl.		Tail length	
Jan. 20	13 40	20 52.3	-12	$8^\circ$	Straight (estimated)
21	13 40	58.4	10	6.5	Measured, (as all below)
22	13 44	21 03.7	8.0	9.5	
23	Cloudy				
24	13 38	21 13 23	4.5	11	Position of condensation
25	13 21	18 05	3.1		in Tail:
26	13 36	21 56	2.0	24	$22^h 32^m + 7.5$
27	13 24	26 07	-0.85	26	22 46 8.8
28	13 38	29 24	+0.1	32	22 59 10.0
29	13 39	31 23	1.0	33	23 17 12.5
30	13 43	34 05	1.85	37	23 29 14.7
31	13 44	36 39	2.6	39	23 38 16.4
Feb. 1	13 41	39 01	3.2	40	23 43 17.9
2	13 50	40 53	3.76	42	23 46 19.7
3	Partly cloudy			45	23 49 19.9
4	Partly cloudy				
5	Partly cloudy				
6	13 49	21 48 06	+6.0	45 $\pm$	Too faint.

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