

Prepared under JPL contract W0-8122



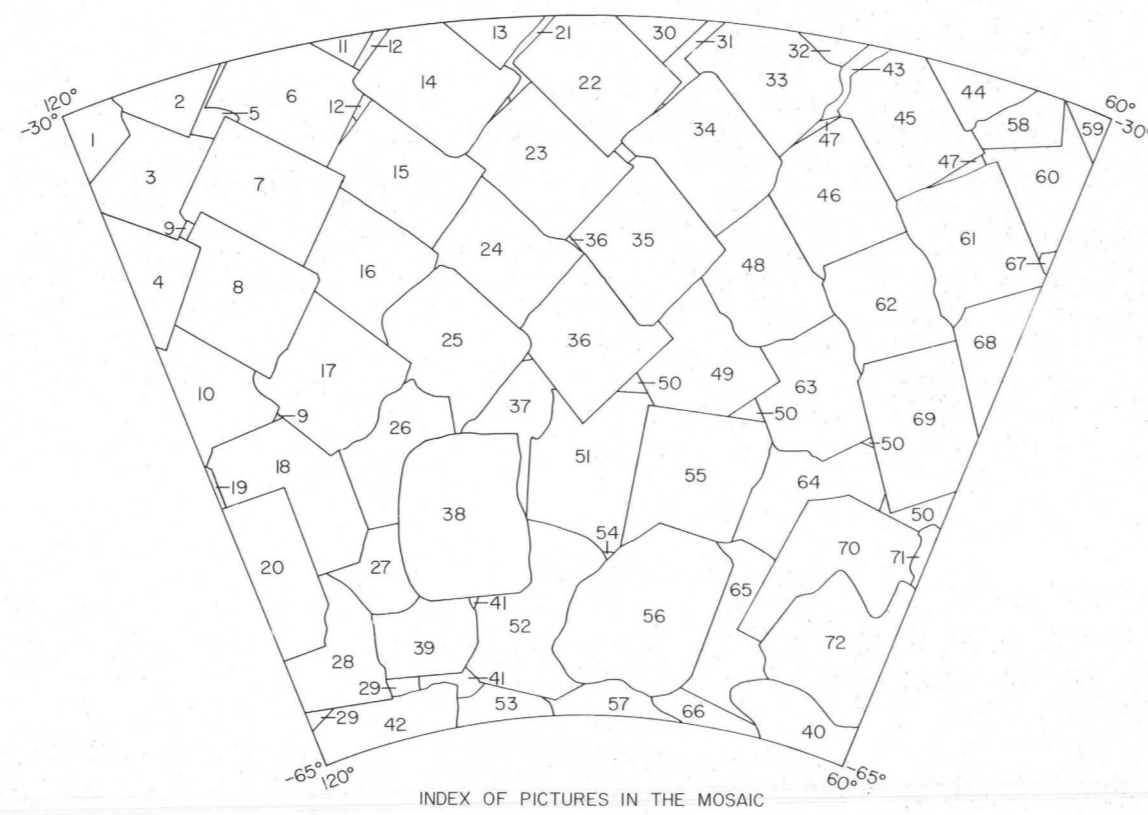
This mosaic was made with Mariner 9 pictures provided by the Jet Propulsion Laboratory (JPL), California Institute of Technology. The Image Processing Laboratory (IPL) of JPL processed the digital pictures to remove image artifacts and geometric distortions, to enhance high-frequency topographic detail while subduing low-frequency albedo variation, and to transform the pictures to a Lambert conformal conic projection. The U.S. Geological Survey performed further artifact removal and modified contrast and tone of each picture analytically on the digital magnetic tapes provided by IPL for uniformity of tone and contrast within the mosaic. Photographic reproductions of the pictures were generated from the magnetic tapes and mosaicked by the U.S. Geological Survey.

Primary horizontal control points, where available, controlled the placement of pictures. Where these points were not available, picture placement was controlled by spacecraft tracking data and by matching images in overlap zones between pictures. Discrepancies in matching these images are less than 10 km over 90% of the mosaic. The number designations and positions of the primary control points, shown by broken crosses (—), are those given by Davies and Arthur (1973).

Azimuthal latitudes are shown on this mosaic. The projection is based on a theoretical dynamical ellipticity of 1/192. The scale is based on an equatorial radius of 3393.4 km.

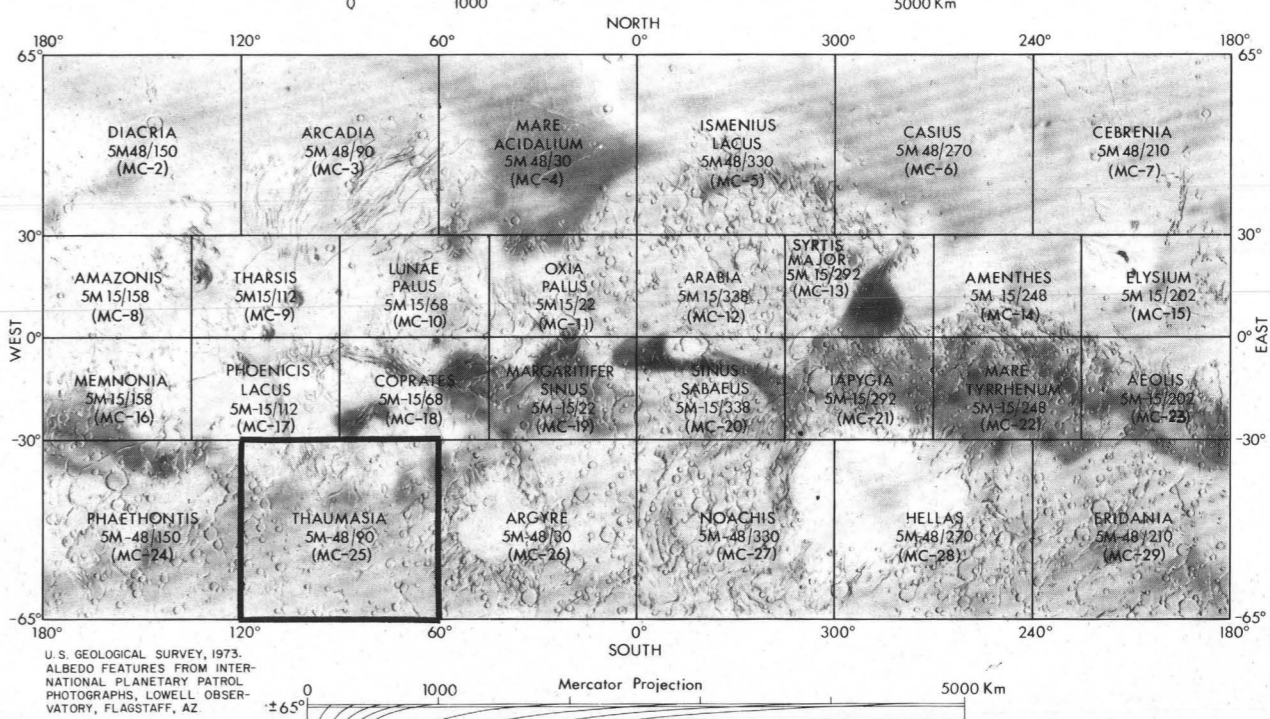
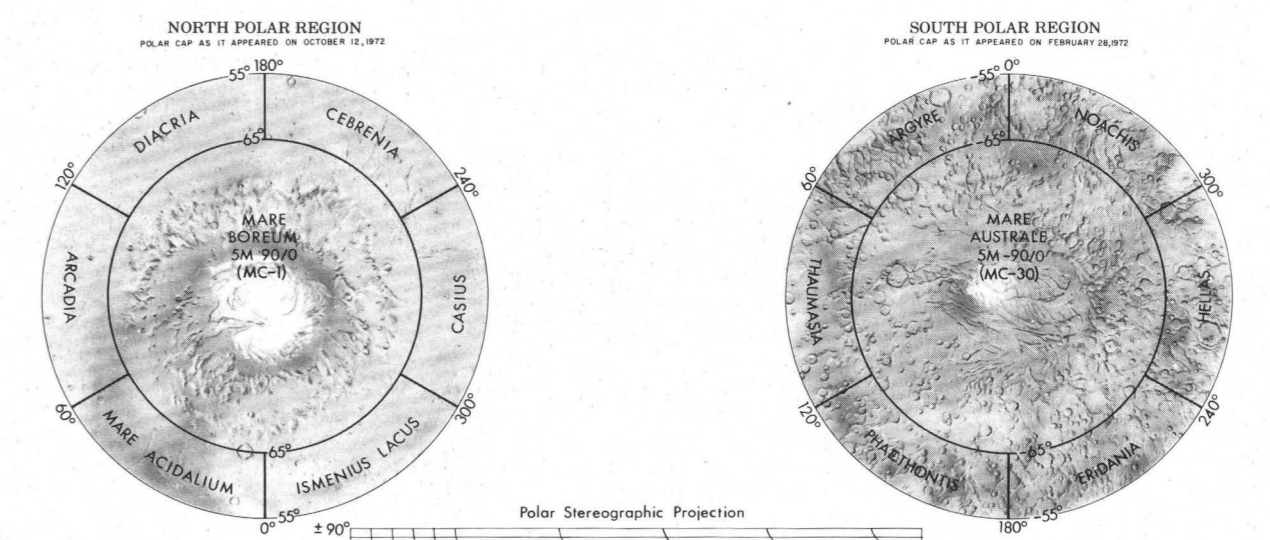
Selected References

- Batson, R. M., 1973, Cartographic products from the Mariner 9 mission: Jour. Geophys. Res. (in press).
- Davies, M. E., and Arthur, D. W. G., 1973, Martian surface coordinates: Jour. Geophys. Res. (in press).



IDENTIFICATION NUMBERS OF PICTURES IN THE MOSAIC

Index No.	DAS No.	Index No.	DAS No.	Index No.	DAS No.
1	8585259	25	5995043	49	6138895
2	5779373	26	5994693	50	5380533
3	5779305	27	5994623	51	6138543
4	5779235	28	5994553	52	6210293
5	8657219	29	6066443	53	6282113
6	5851333	30	5995323	54	6210363
7	5851263	31	8873169	55	6210433
8	5851193	32	6067283	56	6282183
9	5236873	33	6067213	57	6354003
10	5851123	34	6067143	58	9016949
11	5851053	35	6067073	59	6211063
12	8729249	36	6067003	60	6210993
13	5923563	37	6066653	61	6210923
14	5923293	38	6066583	62	6210853
15	5923223	39	6066513	63	6210783
16	5923153	40	6497783	64	6282323
17	5923083	41	6138403	65	6354073
18	5922733	42	6138333	66	6423893
19	5850773	43	8945059	67	6282813
20	5922663	44	6139173	68	6282743
21	8801209	45	6139103	69	6282673
22	5995253	46	6139033	70	6354143
23	5995183	47	5452683	71	6426033
24	5995113	48	6138963	72	6425963



Mars (Thaumasia quad.) - Photomosaic 1:4,356,000 - 1973

THAUMASIA
MC-25
M 5M-48/90 SM
SEMICONTROLLED PHOTOMOSAIC
JUNE 1973

U. S. Geological Survey
OPEN FILE REPORT
This report is preliminary and has not been edited or reviewed for conformity with Geological Survey standards or nomenclature.

LOCATION OF QUADRANGLE ON MARS

U.S.G.S. 73-340
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