**MAIN TITLE:** Semi-controlled Mosaic of Dione

**SUBTITLE:** Dido

**MAP SHEET DESIGNATION:**
SD 1M -43.5/45 SMN, 2011

**MAP SUMMARY:**

The mosaic consists of images from the Cassini spacecraft's narrow-angle camera. The images were taken during the Cassini mission at Saturn. The mosaic covers the entire visible surface of Dione, a moon of Saturn, and includes a range of surface features such as craters, ridges, and grooves. The mosaic is a valuable resource for studying Dione's geology and topography.

**MAP PROJECTION:**

- Lambert conformal projection with two standard parallels at 58° and 30° S.
- Grid system planar cartographic datum, equidistant.

**MAP SCALE:**

1:3,008,890

**GRID SYSTEM:**

- Lambert conformal projection
- Grid system planar cartographic datum, equidistant.

**REFERENCE:**

Names are suggested by the WGS84 T-cartographic Committee and approved by the International Astronomical Union (IAU) for use for the Celestial System of Cartographic Coordinates and Rotational Elements as standard (Archinal et al., 2011).

**REFERENCES:**


**MAP DESIGNERS:**

Thomas Roatsch, Th. Wählisch, M., Hoffmeister, A., Matz, K.-D., Scholten, F., Kersten, E., Wagner, R.

**IMAGE PROCESSING:**

- Photometric correction using the Hapke bidirectional reflectance function
- Map projection
- Photogrammetric adjustment using limb-fitting techniques
- Geometric correction
- Image stitching
- Feature detection
- Presence of the moon

**GENERAL NOTES:**

The mosaic is a semi-controlled mosaic, which means that it is not fully automated but requires some manual intervention. The mosaic is created using images from the Cassini spacecraft's narrow-angle camera. The images are corrected for atmospheric effects and then projected onto a map projection. The mosaic is used for studying Dione's surface features and for geologic mapping.

**MAP OBJECTS:**

- Craters
- Grooves
- Ridges
- Bright areas
- Dark areas

The mosaic is a valuable resource for studying Dione's geology and topography.