JOHN WELLS, SCIOGRAPHIA OR THE ART OF SHADOVVES

London 1635

SCIOGRAPHIA, THEART SHADOVVES.

Plainly demonstrating, out of the Sphere, how to project both great and small circles, upon any Plane whatfoever : with a new Conceit of re-flecting the Sunne beames upon a Diall, contri-ved on a Plane, which the direct beames can never fhine upon.

TOGETHER

With the manner of cutting, the five Regular Platonicall bodies; and two other, the one of 12, the other of 30 Rhombes, never difcovered heretofore; also the finding of their Dedinations, and Redinations, and adorning them with variety of Dials.

All performed, by the Doctrine of Triangles; and for eale, and delight fake by helpe of the late invented, and worthily admired Numbers, called by the first Inventor Logarithmes.

By I. W. Efquire.

LONDON Printed by THOMAS HARPER, and are to be fold on Pauls Church-yard, at the figne of the Bell, 1035.

"SCIOGRAPHIA. THE ART Or OF SHADOVVES" is a small but thick book containing the following:

CHAP. I.

How to divide divers lines, and make a chord to any proportion required.

CHAP. II.

Of the several Cases and varieties of right lined Triangles, with diverse cautions to be observed in the practice of them.

CHAP. III.

The several Cases and varieties of sphericall triangles, with divers cautions to be observed in the practice of them.

CHAP. IV.

The explanation and making of the fundamentall Scheme.

CHAP. V.

An abstract of the Art of Dyalling, by which briefe view of the severall Planes, and what is requisite in every of them, the rest of the work is better understood, and more easily performed.

CHAP. VI.

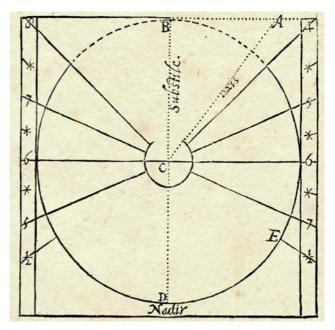
To draw the houre lines upon the verticall, commonly called the horizontall plane, the elevation of the pole being given.

CHAP. VII.

To draw the hour lines upon a direct South plane, the heighth of the pole being given.

CHAP. VIII.

To make a Diall to a North direct plane, the opposite to the former.



Chapter 8. A Direct North Dial

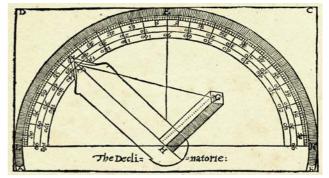
CHAP. IX.

To draw the houre lines upon a direct East or West plane. CHAP. X. The first part.

How to finde the declination and reclination of any plane.

C H A P. X. The second part.

How to draw the houre lines upon a South or North erect plane, declining East or West, to any declination given.



Chapter 10. A Declinatory

CHAP. XI.

To draw the houre lines vpon any plane declining farre East or West, or any other, in which the houre lines runne close together, by help of two equinoctiall lines without respect to the center.

CHAP. XII.

To draw the houre lines upon any direct plane, reclining or inclining East or West.

CHAP. XIII.

To draw the houre lines upon any direct south reclining or inclining plane.

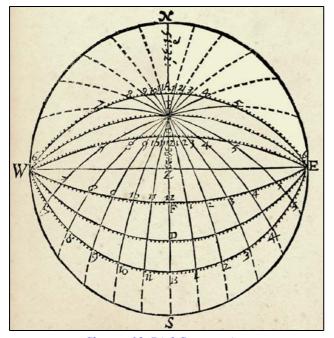
C H A P. XIV.

To draw the houre lines upon any direct north reclining or inclining plane.

CHAP. XV.

To draw the houre lines upon a declining reclining, or declining inclining plane.

Number of Pages: 468. Illustrations: Many



Chapter 13. Dial Construction.

CHAP. XVI.

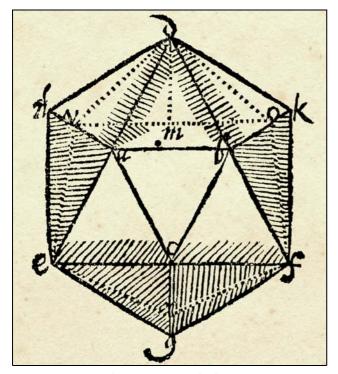
To draw the houre lines upon a South reclining plane, declining East or West which passeth between the Zenith and the pole.

C H A P. XVII.

To draw the houre lines upon a South reclining plane, declining East or West which passeth the Pole and Horizon.

C H A P. XVIII.

To draw the houre lines upon the polar plane declining East or West, being the first variety of North declining reclining planes.



Chapter 23. Icosahedron.

C H A P. XIX.

To draw the houre lines upon a North reclining plane, declining East or West, which cutteth the Meridian betwixt the Zenith and Equinoctiall.

CHAP. XX.

To draw the houre lines upon a North reclining plane, declining East or West, which cutteth the Meridian betwixt the Æquator and Horizon.

C H A P. XXI. To draw the houre lines upon any inclining plane opposite to the direct reclining.

CHAP. XXII.

To draw the houre lines upon any inclining declining plane opposite to the reclining declining.

CHAP. XXIII.

Of the manner of cutting divers bodies in wood or stone, and the making of Dials upon them.

> C H A P. XXIV. How to cut the bodie of 12 Rhombes.

> > CHAP. XXV.

How to describe the Paralels of the Signes, and diurnall arches upon any of the aforesaid Planes.

C H A P. XXVI. The second sort: East and West Equinoctiall reclining, Equinoctiall reclining declining.

C H A P. XXVII. The third sort Horizontall South and North direct, declining, declining reclining.

> C H A P. XXVIII. To describe the diurnall arches upon any Plane.

C H A P. XXIX. How to draw the Iewish houres, commonly called the old unequall houres upon any Plane.

C H A P. XXX. How to describe the Azimuthes and Almicanters upon each Plane.

> C H A P. XXXI. The second sort.

C H A P. XXXII. Their third sort.

C H A P. XXXIII. How to describe the circles of position upon these Planes.

C H A P. XXXIV. To draw a Diall upon the seeling of a Roome.

C H A P. XXXV. Divers propositions necessary for Dialling.

C H A P. XXXVI. Divers other Propositions of the Spheare in ordinary use to be performed by right angled sphericall triangles only.