SPATIAL CONSTRUCTION.

39), we may say more accurately that the angles, between a line and its projection upon a plane, are the least and the greatest of all the angles made by the given line with lines lying in the plane.

Cor. 2. Since O, P, N are complanar (Art. 6), and $\angle PNO$ is a 7, the $\angle OPN$ is the complement of the $\angle PON$. Therefore the angle between a line and a plane is the complement of the angle between the line and a normal to the plane.

Cor. 3. Let OB be a planar line \perp to OP.

Since *PN* is normal to *U*, *OB* is \perp to *PN* (Art. 9. Cor. 2); and hence *OB*, being \perp to *OP* and *PN*, is \perp to *ON*.

Therefore planar lines which are perpendicular to any line that meets their plane are also perpendicular to the projection of that line upon the plane.

13. Def. A line is parallel to a plane when it meets that plane at infinity.

Cor. Any plane through one of two parallel lines is parallel to the other line.

For if L and M be two parallel lines, and the plane U contains L and not M, it can meet M only where L meets M. But L and M meet at infinity (P. Art. 220); therefore M meets U at infinity, or is parallel to U.

SPATIAL CONSTRUCTION.

14. In making constructions in space we assume the ability:

1. To draw through any given point a line parallel to a given line.