

first year: assignment eleven

A cube of space

Issued	Wednesday, October 24, 2007 @ 4.00 p.m.
Objective	<p>Design a cube of articulated spaces when the composition of three non-parallel planes from project ten are inserted into a 5" cube (20' x 20" @ 1/4" = 1'-0")</p> <p>The primary objective of this assignment is the establishment of a hierarchy of clearly defined spaces within the cube as a product of the inserted planes. Through this process, you are to understand the fundamental principles of spatial definition and articulation.</p>
Method Working	<p>The inserted planes (rectangular, mutually perpendicular, non-parallel) of project ten are to be placed orthogonal with the cube. Modify/ recompose the planes as required to fit completely within the cube. Attach the planes to two of the interior surfaces of the cube. The cube is to have no top or bottom, and six sides.</p> <p>Design/ compose a series of openings on the surface of the cube. These openings are to be simple rectangles, squares, or slits (approximately 1/16" wide) and are to mark the boundaries of the interior spaces generated by the planes.</p> <p>The faces (surfaces) should be developed consistently, with particular attention given to the corners of the opening to define the interior spaces. Checkerboard patterns are to be avoided. Le Corbusier's Modular dimensions may be used to govern proportions of the spaces, planes, openings, etc.</p> <p>The planes can not extend beyond the surfaces of the cube.</p> <p>Due: Friday, October 26, 2007 @ 1.30 p.m. (freehand design studies and one chipboard model) Due: Monday, October 29, 2007 @ 1.30 p.m. (drafted on vellum drawing of 6 orthographic views, three sectional views and one 30° x 60° axonometric (showing the exterior with the planes within) and a revised chipboard model) Due: Wednesday, October 31, 2007 @ 1.30 p.m. (revisions to the drafted on vellum drawing and chipboard model)</p>
Design Process	<p>Wood pencils Tracing paper (12" x 12" sheets) (2) Vellum sheets 23" x 29" Chipboard of 1/16" thickness Elmer's glue</p>

Final
Presentation

Presentation quality model with machine-like precision of white Strathmore, 4 ply cold pressed (The art store now has this material) with Color-Aid Gray #4 and Color-Aid Black #1 laminated to both sides of the individual interior planes.

Presentation quality drawing including 6 orthographic views, three sectional views, and one 30° x 60° axonometric. Drawing to be at full scale and drafted in pencil on a horizontally oriented sheet of 23" x 29" Strathmore 500 Series Bristol Board, 2 ply (the watermark should be on the left hand side). Neatly adhere the Color-Aid Gray #4 and Color-Aid Black #1 to the axonometric drawing.

Lead holder(s) with 3 suggested leads: 2H (light: construction), H or F (light/ medium: contours/ elevation), HB (dark: edges & section cuts)

Due

Friday, November 2, 2007 @ 4.20 p.m. (Model Due)
Monday, November 5, 2007 @ 1.30 p.m. (Drawing Due)

A DEMONSTRATION: VALUES AND EXERCISES

VALUES

The limitless numerical values:

VALUES EXPRESSED IN METRES				VALUES EXPRESSED IN FEET AND INCHES	
RED SERIES: RO		BLUE SERIES: BL		RED SERIES: RO	BLUE SERIES: BL
cm.	m.	cm.	m.	inches	inches
95,280.7	959.80				
58,886.7	588.86	117,773.5	1,177.73		
36,394.0	363.94	72,788.0	727.88		
22,492.7	224.92	44,985.5	449.85		
13,901.3	139.01	27,802.5	278.02		
8,591.4	85.91	17,182.9	171.83		
5,309.8	53.10	10,619.6	106.19		
3,281.6	32.81	6,563.3	65.63		
2,028.2	20.28	4,056.3	40.56		
1,253.5	12.53	2,506.9	25.07		
774.7	7.74	1,549.4	15.49	304.962" (305")	609.931" (610")
478.8	4.79	957.6	9.57	188.479" (188½")	376.966" (377")
295.9	2.96	591.8	5.92	116.491" (116½")	232.984" (233")
182.9	1.83	365.8	3.66	72.000" (72")	143.994" (144")
113.0	1.13	226.0	2.26	44.497" (44½")	88.993" (89")
69.8	0.70	139.7	1.40	27.499" (27½")	55.000" (55")
43.2	0.43	86.3	0.86	16.996" (17")	33.992" (34")
26.7	0.26	53.4	0.53	10.503" (10½")	21.007" (21")
16.5	0.16	33.0	0.33	6.495" (6½")	12.985" (13")
10.2	0.10	20.4	0.20	4.011" (4")	8.023" (8")
6.3	0.06	12.6	0.12		
3.9	0.04	7.8	0.08		
2.4	0.02	4.8	0.04		
1.5	0.01	3.0	0.03		
0.9		1.8	0.01		
0.6		1.1			
etc.		etc.			

THE INCH 2.539 cm.
 THE FOOT 30.48 cm.