## MORPHOLOGY STUDY - Copley Square

Notes on an inventory of elements and an analysis of size and scale relationships.
The work of this study was based on eight different photographs from the Copley Square series. All views were taken from nearly eye-level, and were generally looking into the Square from different approaches. Print size was 8 " x 10 ".

The results of the inventory and analysis are graphically recorded in eight ink tracings. (An additional sheet contains a scale map of the area, with the location of the view points and information on the heights of the major elements of the area.)

The inventory and analysis are organized under three headings:

1. Space is recorded by a line drawing, traced from the photo, using the means of linear perspective and overlapping. The absolute dimensions of the visable space are recorded in an adjacent map-diagram: in which the visable surfaces are cross-hatched.
2. Surfaces, categorized as sky-plane, floor-plane, wall plane, and miscelaneous, are recorded by photo-tracings. Sky and floor planes generally indicate only the silhouette-form. Wall planes (generally building facades), show the major surface quality - window pattern, cornice lines, or shadows. The size - analysis of the surfaces is by percentage (roughly estimated) of the total photo-print field occupied, in each of the above categories.
3. Volumes: free-standing elements, more or less isolated in space, are recorded by contour photo tracing; and thus illustrate their projected size by direct comparison, isolated from their field-context. A vertical linear comparison is made of the major elements, and of the major vertical surfaces.

Comments on this study follow. A basic question that arises is on the relationship of the field of the photograph, recording all light-data impartially; to that of an observer's field of vision, organizing light data selectively and endowing this data with personal meaning. It is suggested that just because of this, the camera recording(in this series of photos) has a certain value; that of enabling us to perform an objective analysis of the elements. And as long as the camera field is constant (presuming the same lens and a consistant viewing position and direction) the various camera recordings will be consistant.

The inventory and analysis is an excellent method of developing an awareness of the basic elements of the urban scene; and as much might be used to good advantage in teaching. A second application would be in the objective comparison of different localities or areas - different in place, or in time. Comparisons on the basis of relative percentage of defining surfaces, or heights of volume elements, or occurrence of common elements, for example, may lead to objective definitions of uniqueness. The present study deals with only the Copley Square area, and it should be compared with a similar
study of several other locations. It would be interesting to see, for example, how the breakdown of sky, pavements, facades and miscelaneous of $30 \%, 30 \%, 30 \%$ and $10 \%$ (which is roughly the ratio found in these eight examples) compares with other places.

A third application would be the use of the method in the analysis of a linear sequence of photographs; to note the changes (if any) of the existence or proportions of space, surface or volume elements.

A fourth use in area identification would be by a qualitative study of area-to-area variations occurring in individual aspects such as the silhouette-form of the sky area, or the opacity or reflectivity of facade areas.

This present Copley Square study is admittedly only a crude initial exercise. The chief element lacking is an indication of the light and color qualities of each view. Perhaps this could be best handled in the surface section where the distribution of hues and values could be recorded as to their position and extent. Their extent could be easily incorporated into the circular diagram.

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