EVALUATING A HOUSE PLAN

Bonny Lay*

When buying a house or selecting a plan for building a new one, whether it is a conventional house, an apartment or a mobile home, your attention may be diverted by features such as attractive fireplaces, luxurious bathrooms or impressive entrances. But no matter how attractive these features may be, do not allow them to distract you from a very important aspect, the plan. Whether you are building or buying, there are eight major points to consider in determining if a house plan will be suitable for your family.

Space for Family Needs

Many factors — family size, age and sex of members, stage in life cycle, personalities, style of living and economic status — determine the amount of space a family needs. An active family with varied interests will need more space than a less active family with similar interests. Usually, as family size increases, the amount of square footage per person becomes less. For this reason, it is difficult to be exact about how many square feet a house should have. Most authorities say that generally there should be from 200 to 300 square feet per person.

The same amount of footage can be allocated in differing proportions to the areas for group, work or private activities. Total square footage should be distributed according to family needs. For an active family with children which is group oriented and entertains often, the higher proportion of square footage probably will be in group or work areas of the home — the kitchen, dining, family or living rooms, plus outdoor living areas. For the less active family, with individuals spending much time in privacy, the higher proportion of square footage probably will be in the private area of the house — bedrooms.

Often, much-needed space is taken up by rooms seldom used, such as formal living and dining rooms and guest bedrooms, when the space could best serve the family's needs if it were in a more useful area.

Usable Living Space

House plans are often deceptive because one usually considers all space as useful living space. Often, much space is used for non-living uses, such as allowance for the swing of doors, garages, storage areas, closets, halls, passageways, entrances and built-in or stationary equipment. Some space is needed for these non-living uses, but in carefully designed house plans a high percentage of available space is for living uses.

Activity Areas

Three general areas — for group, work and private activities — should be identified on the house plan. The group activity area usually includes the dining, living, family and play or recreation rooms, plus the patio or porch. The area for work includes the kitchen, utility and workshop or hobby rooms. The area for private activities includes bedrooms, bathrooms and possibly a study.

*Extension housing and home furnishing specialist, Texas A&M University.
Rooms usually associated with an area should be grouped together. For example, noisy areas such as the kitchen, laundry and hobby room should be adjacent to each other and separated from the quiet area.

These areas should be separated by buffers which may be closets, storage walls, chimneys, halls or other seldom used spaces. Buffer spaces reduce noise transfer from the noisy areas to the quiet areas.

Indoor areas should be coordinated with outer areas. For example, the outdoor living area, patio or terrace is convenient when it is adjacent to the living area of the house; the service area of the yard is convenient when it joins the work area of the house.

**Circulation Patterns**

Circulation or traffic patterns should be short and direct, passing through a minimum of rooms except those planned for traffic such as halls or passageways. You should be able to go from room to room without passing through another room, taking devious routes or crossing congested areas. Circulation patterns through rooms reduce usable space.

Family rooms often have much traffic when located between the bedroom area and the kitchen area, as in many U-shaped and H-shaped plans. Circulation problems are reduced when they are dead-end rooms, not cross roads.

To reduce circulation problems, locate doors near corners, directly opposite each other or close together; have walls or passageways; reduce the number of doors or rearrange furnishings.

**Room Size and Shape**

Actual square footage is the major factor in determining if a room is a suitable size, but proportions and shapes, location of architectural features such as doors and windows and type of interior design may alter the apparent size. The

<table>
<thead>
<tr>
<th>Room</th>
<th>Size*</th>
<th>Size**</th>
</tr>
</thead>
<tbody>
<tr>
<td>Living Room</td>
<td>160-180 sq. ft.</td>
<td>150-320 sq. ft.</td>
</tr>
<tr>
<td>Dining Room</td>
<td>80-110 sq. ft.</td>
<td>100-215 sq. ft.</td>
</tr>
<tr>
<td>Kitchen</td>
<td>60-80 sq. ft.</td>
<td>50-140 sq. ft.</td>
</tr>
<tr>
<td>Bedrooms</td>
<td>80-120 sq. ft.</td>
<td>80-220 sq. ft.</td>
</tr>
<tr>
<td>Bath</td>
<td>Enough space for lavatory, toilet and bathtub or shower.</td>
<td>34-96 sq. ft.</td>
</tr>
</tbody>
</table>

*Federal Housing Administration.  
**Architectural Graphic Standards.
previous table gives the Federal Housing Administration's minimum room size range for a one-bedroom to a four-bedroom house and room size range from the minimum to very large from *Architectural Graphic Standards*. This table gives an idea of how large most rooms are.

The basic shape of a room can affect its usefulness. The most common shape is the rectangle, which is easy to furnish. But when a rectangular room is too long and narrow or nearly square, it will not be as pleasing a shape.

Square rooms are usually more difficult to furnish, but the L-shaped room is very convenient for furniture arrangements in dual-purpose rooms. For example, use one end of a family room for dining and the other for conversation. Unusually shaped rooms such as circles, octagons and free forms can add interest and excitement to a home but are difficult to furnish.

**Accommodating the Furniture**

Furniture arrangement is a major concern when evaluating a house plan. Floor space should be sufficient to accommodate the furniture you plan to put into the rooms, with enough space remaining for circulation. Also allow sufficient wall space for large pieces of furniture such as sofas and king-size beds.

To determine whether furniture will fit, compare the sizes and shapes of the rooms with ones in which the furniture is now located. Another way is to draw the rooms to scale and place furniture cut-outs, drawn to scale, on the plan. This will help you visualize the actual furniture arrangement.

**Storage Space**

Storage spaces are needed in each area of the house — near the entrance, in the kitchen, in bedrooms, in the family room, near the patio and in the garage. People often forget to allow space for such seasonal items as Christmas decorations, out-of-season clothing, outdoor cooking equipment and sports or hobby equipment. General storage should be provided in halls for such items.

To determine if there is adequate storage, compare it with the amount you currently have. Or, list all articles to be stored and the space required and compare it with available space. Generally, plan for a lot of storage space, for seldom will you have too much.

Usually, a typical average-sized family will have enough belongings to fill a space 10 x 20 feet. This means 200 square feet of storage will be needed. A minimum of 5 to 6 feet of rod storage is needed per person for a liberal amount of hanging clothing. Additional space is needed for folded clothing, linens, kitchen equipment, foods, cleaning equipment and seasonal items.

**Flexibility**

The family changes as it progresses from one stage of the life cycle to another; therefore, its housing needs change. Changes in its composition plus changes in its financial situation often necessitate changes in the house plan. Consider how the use of various rooms might change as the family progresses through its life cycle. For example, a playroom might later become another bedroom or a study.

A family often begins with a small house, with the intention of adding more rooms later. If this is in your future, choose a plan to which additions or changes can be made easily. If your family plans to keep a house for life, then consider how the plan can be changed to accommodate needs during the latter years when less space is needed and comfort and convenience are most important.

Today, families move several times; therefore, consider if the house could be changed to fit another family's needs. House plans which are too personal may reduce the resale value of the house, for it is difficult for a new family to change the plan.

**References**

