

Accepted Meeting Planning Formulas

Calculations are not easy ... but knowing how and when to use industry-accepted formulas for different aspects of meeting management can save you time and effort. Look no further than these pages to determine which formula will give you the information you need.

Audiovisuals

Audiovisual (A-V) Room Capacity

A general rule of thumb to follow for quick estimates of a-v room capacity is to divide the square footage of the room by 10' per person for theater capacity and 15' per person for classroom capacity.

Principles:

- The 5' principle: The minimum distance from the floor to the bottom of the projection screen is 5' (over people's heads).
- The 2 x 8 principle: No one should be seated closer to the screen than two times the height of the projected image, nor further from the screen than eight times the height of the projected image.

Preferred Seating Styles for A-V Presentations:

- Theater
- Classroom
- V-Shaped

A-V Materials:

- The accepted standard in a-v artwork with a 6" x 9" information area is that no character should be less than 1/8" in height.
- Readability is maximized by the 6 x 6 rule: no more than six words per line and six lines per page of text.
- Use of upper and lower case letters in the body copy is much easier to read than all upper case text.

Source: *Professional Meeting Management, third edition*, published by the Professional Convention Management Association

Financial Management

Break-Even Analysis:

Break-even analysis shows at what point the meeting income will cover expenses. If the financial goal is to break even, it allows the projection of required attendance, number of exhibitors, sponsorship income, etc. needed to achieve that goal. If the meeting is designed to show a profit, that amount must be added as an expense. When the meeting breaks even, the profit will have been realized.

There are two ways to conduct a break-even analysis:

1. Break-even units:

$$\text{break-even units} = \frac{\text{total fixed expenses}}{\text{price} - \text{variable cost per unit}} \\ \text{(contribution margin)}$$

- *fixed expenses* are those expenses that do not vary based on the number of attendees (ex., speaker fees)
- *price* is usually the attendee registration fee
- *variable costs per unit* are per person costs, or costs that change based on the number of people attending
- *contribution margin* is a term used to identify the amount of the registration fee that is contributed to covering fixed or overhead costs (price minus per person costs)

Example:

If a registration fee of \$200 is used to determine the income budget, and fixed costs of \$20,000 and per person (variable) costs of \$75 are used to determine the expense budget, the break-even units (number of attendees) will be 160.

$$\text{break-even units} = \frac{\$20,000}{\$200 - \$75} = 160$$

In this case, the income and expense budgets should be based on 160 attendees.

2. Break-even price:

If the registration fee has not been determined, calculate the break-even price.

$$\text{break-even price} = \frac{\text{total fixed expenses}}{\text{number of attendees}} + \text{variable costs}$$

Using the above example:

$$\text{break-even price (registration fee)} = \frac{\$20,000}{160} + \$75 = \$200$$

Source: Professional Meeting Management, third edition, published by the Professional Convention Management Association

Food and Beverage

How to Determine Seating Capacity for F&B Functions
By Brad Weaber

Nothing is more frustrating to a meeting manager than a food and beverage function that goes awry. Ironically, most of the logistical challenges of a f&b function can be avoided by planners if the proper formulas are applied well before the event. Blocking the correct space is only one of several areas that should be managed for a successful “sit-down” event.

Determining the space needed for the optimal set-up of a banquet is somewhat difficult because of the numerous variables to consider. For example, hotels use three different sizes of banquet rounds. Each of them can have (depending on who you are listening to) three different seating capacities. Some hotels are now using ovals, which, though they use space more economically, make calculations more tricky.

However, there is a way to get a good handle on the banquet capacity of a room, and it involves nothing more than common sense. (Since oval tables are still relatively rare, the formulas and charts that follow will refer to banquet rounds only.)

When calculating with round tables in a room, you need to “square off” the measurements. Taking into account the amount of space needed for seated guests as well as space needed for aisles between the tables, yields the “linear feet” needed for each table.

Here is the linear footage needed for banquet rounds:

- 60” rounds: 10 linear feet per table seats six to eight
- 66” rounds: 10.5 linear feet per table seats eight to 10
- 72” rounds: 11 linear feet per table seats nine to 11.

Once you know the diameter of the table in the hotel’s inventory, you only need to get the dimensions of the clear seating area to determine the room’s capacity.

Example: You have a room where the dimensions are 108’ x 80’, and you are only using 6’ (72”) rounds. There is no speaker or other activity in the room, and the meal is plated. (As previously mentioned, 11 linear feet is needed for a 72” table.)

Calculation: $108' \div 11'$ clear seating length = nine tables per row; $80' \div 11'$ clear seating width = seven tables per row; 9 (tables per row) \times 7 (tables per row) = 63 (total number of banquet tables at maximum capacity).

Now that you know how many tables fit into a room, determine how many people you want per table. For this example, 10 people will very comfortably fit around a 72” round. Simply multiply the number of tables in the room by the number of people you wish to put at each table: 63 (total 72” tables in room) x 10 (people per table) = 630 (total people banquet-style). (Note: You may put 11 people around the table as well.) (Be aware, when using this formula that you may have to eliminate one table near each exit door to comply with local fire laws.)

When dancing and entertainment is to be included, a little extra work is necessary to determine the actual clear seating area after you have accounted for the dance floor and risers. Rarely is everyone on the dance floor at the same time (except when the “Electric Slide” is playing!). Using the formulas below, you should be able to comfortably determine the square footage required for the dance floor.

Floor Space Needed for a Banquet with Dancing:

Expected to Be on the Dance Floor at One Time:	Dance Floor Square Footage Needed:
60 %	3 Sq. Ft
50 %	2.5 Sq. Ft.
40%	2 Sq. Ft.

Example: Your event is for 300 people with an average dance participation (50 percent on floor at a given time). 300 (total guests) x 2.5 (sq. ft. needed per dancing guest)= 750 (total square feet of dance floor needed)

If the dance floor were close to square, its dimensions could be almost 27’ x 27’ or 27’ x 30’. (Note: Most floors come in 3’ x 3’ sections.)

To establish the table capacity of the room, subtract the number of tables lost to the dance floor space and bandstand from the total the room is capable of holding.

Source: Brad Weaber is senior account executive in the Washington, D.C. area office (Arlington, Va.) of Conferon, the nation’s largest independent meeting planning company. This article was published in the 1996 July issue of *Convene*.

Room Set Considerations

Room Setup Advantages and Disadvantages

- **Rounds and Half-Rounds**
 - Positives:
 - ample work space
 - good local interaction
 - good food and beverage set
 - Negatives:

- poor full-room interaction
 - sound bleed from close-by tables
- **Squares and Rectangles**
 - Positives:
 - variety of arrangements possible
 - good work space
 - good working atmosphere
 - Negatives:
 - 16" size not big enough for adequate work space
 - extensive skirting may be needed
- **Classroom**
 - Positives:
 - presenter can see all participants
 - accommodates large groups in less space
 - Negatives:
 - minimal interaction possible
 - participants only see each other's backs
- **V-Shapes**
 - Positives:
 - same as classroom, but with more interaction
 - Negatives:
 - usually will not work with large groups
 - participants may be far from the presenter
 - sight lines may not be ideal for all participants
- **T-Shapes**
 - Positives:
 - good for small groups
 - good interaction
 - Negatives:
 - often used for too large a group
 - larger sizes mean poor sight lines and back views
- **Theater Style**
 - Positives:
 - good for large groups when reading/writing are not required
 - Negatives:
 - elevation changes needed for large groups
 - no writing surface
 - minimal group interaction

- **Chairs in a Circle**

- Positives:

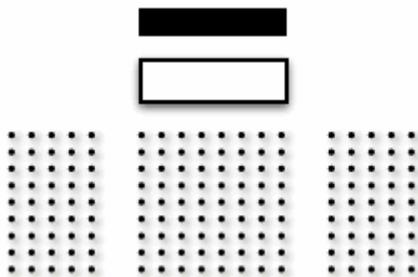
- best for creating informal and participatory groups
 - presents speaker as a group member/facilitator
 - good for groups up to approximately 30 people

- Negatives:

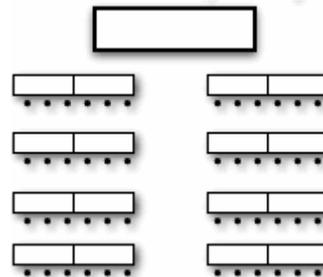
- not good for note-taking
 - not good for presenters with notes or audiovisual aids

Rooms can be set in a variety of styles. A few basic styles include:

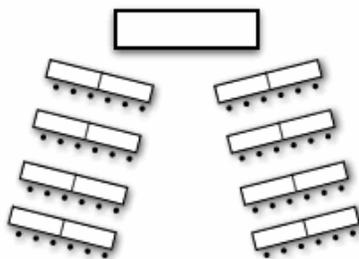
Theater-Style Setup



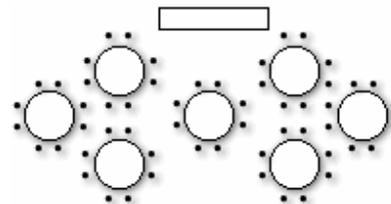
Classroom-Style Setup



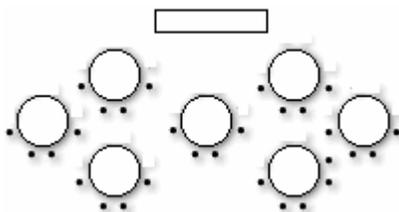
Chevron Classroom-Style Setup



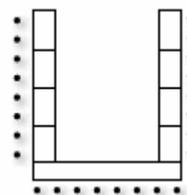
Rounds (Banquet)-Style Setup



Crescent Rounds-Style Setup



Horseshoe-Style Setup



Source: Professional Meeting Management, third edition, published by the Professional Convention Management Association