

GUIDELINES FOR ESTIMATING LENGTH

(Comment)

All calculations are made in terms of single-column PRL lines; whenever a rule gives a line equivalent for a number of characters (letters, numerals, *and spaces*), it is to be understood that a partial PRL line actually counts as a full line.

1. The **title** takes 3 lines for the first 40 characters and 1 line for each additional 40.
2. **Bylines** take 2 lines for each 55 characters of an author-name group and 1 line each for department, institution, city/state(country); one line separates institutional groups.
3. The **receipt date** takes 2 lines.
4. An **abstract** is not included in a Comment.
5. The listing of **PACS numbers** takes 2 lines.
6. For the **text** of the manuscript, the average number of characters (letters and spaces) per manuscript line is estimated and converted to the number of PRL one-column lines by the formula:

$$\frac{\text{No. characters/avg. manuscript line}}{\text{No. characters/avg. PRL line}(= 55)} \times \text{No. manuscript lines} = \text{No. PRL lines}$$

Note: In-line mathematics of more than 25 characters will be treated as displayed material and will be counted as such.

7. A **short displayed equation** (less than 34 characters, excluding equation number; 40 if there is no equation number) takes 2.5 lines; built-up fractions take 3 lines, with parentheses 4 lines; matrices generally take 2–3 lines *per row*, depending on complexity. When the equation has *both superscripts and subscripts* another $\frac{1}{2}$ line is added. A **long equation**, typed across two columns, takes double these amounts. When there are a number of two-column equations, intervening short equations may also be given two-column space.

Note: Short lines or groups of several lines preceding, following, and between equations are included in the equation count.

8. Each **reference** takes 1 line for every 56 characters. Also, 2 lines separate the text and the references.
9. A **figure** that can be scanner-reproduced at one-column width takes 6 lines per inch of final height; if it requires greater width, it takes 12 lines per inch of final height.

A few words regarding figures. Figures are sized (reduced dimensions calculated) on the basis of their content and detail. The size of lettering should be chosen with this in mind. Specifically, choose a lettering size such that when the figure is reduced to approximately the minimum size that will show the details adequately, the smallest on-line (not subscript or superscript) capital letters or numerals will have a reduced size in the range 2.0–2.5 mm, and be sure that lower-case letters and subscripts and superscripts, if any, are not grossly different in size from the capitals. Also choose a line weight such that small open symbols and letters will not fill in. Figures should be planned to be $\leq 3\frac{3}{8}$ inches wide (single column) or $4\frac{1}{2}$ –7 inches wide (greater than one column).

10. Each **figure caption** takes 1 line for each 56 characters. Also, there is 1 line between a figure and its caption, and 2 lines between text and figure or caption (double these amounts if the figure requires greater than one-column width).
11. Each line (including double rules) in a **table** becomes 1 *or* 2 lines for a table small and simple enough to be typed—1 if the table fits into one column (56 characters including 3 spaces between columns of the table itself), 2 if it is wider. Two lines in each column separate text from a table or caption. A **table caption** is counted as 1 line for each 56 characters.