Determining Amounts of Fertilizer for Small Areas

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A home gardener knows that a good fertilization program will result in optimum yields from vegetable crops. A complete fertilizer is one that includes nitrogen, phosphorous and potassium, and it should supply the plants' nutrition requirements from planting to harvest.

Unfortunately, the recommended rates of commercial fertilizers are often given on the per-acre basis. Using the following tables, you can easily convert per-acre rates into amounts for small areas.

Conversion of fertilizer rates from per-acre basis to amounts for smaller areas.

Rate per Acre	100 Sq Ft	1000 Sq Ft
lb	lb	lb
100	1/4	2-1/3
200	1/2	4-2/3
400	1	9-1/4
500	1-1/5	11-1/2
600	1-1/2	14
800	1-4/5	18-2/5
1,000	2-1/3	23
2,000	4-1/2	46

Use the table below to convert per-acre amounts of fertilizer into rates for 10 feet of row at different row spacings.

Conversion of fertilizer rates from pounds per-acre basis to ounces per 10 feet of row, at three different spacings.

Rates per Acre	Distance Between Rows			
	One Foot	Two Feet	Three Feet	
lb	oz	oz	oz	
100	1/3	3/4	1-1/8	
200	3/4	1-1/2	2-1/4	
400	1-1/2	3	4-1/2	
500	1-3/4	3-2/3	5-1/4	
600	2-1/4	4-1/2	6-3/4	
800	3	6	9	
1,000	3-3/4	7-1/2	11-1/4	
2,000	7-1/2	15	22-1/2	

When individual plants are established and the recommended fertilizer rate has been determined on the per-acre basis, use the following table to find the amount of fertilizer needed per plant.

Conversion of fertilizer rates from pounds-per-acre basis to ounces per plant, at various spacings.

Rates per Acre	Distance Between Plants			
	5 x 5 ft	$\frac{2^{1}/_{4} \times 2^{1}/_{4} \text{ ft}}{2^{1}}$	2 x 1 ¹ / ₂ ft	
lb	oz	oz	oz	
100	1	1/4	1/8	
200	2	1/2	1/4	
400	3-3/4	1	1/2	
500	4-3/4	1-1/4	2/3	
600	5-3/4	1-1/2	3/4	
800	7-1/2	2	1	
1,000	9-1/4	2-1/3	1-1/4	
2,000	18-1/2	4-2/3	2-1/4	

