

## PRODUCING SUMMER SQUASH WITHOUT POLLINATION – RANKING VARIETIES

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Many growers are interested in the ability of summer squash to set fruit without the benefit of bee pollination (parthenocarpy). Organic growers often use row covers to exclude pests but need to remove these once female flowers are produced in order to allow for pollination. In addition, all growers are concerned about the health and availability of natural bee populations. In 2013, a field trial was conducted with 21 varieties of summer squash to determine which were capable of setting fruit without pollination. Female flowers were bagged prior to opening to exclude pollinating insects. After 1 week, bags were removed and fruit rated as to whether it was marketable or not. There were major differences as can be seen in Table 1.

**Table 1. Ability of summer squash to produce fruit without pollination**

Variety	Type	Color	Total Flowers Bagged	% Fruit Set of Bagged Flowers
Golden Glory	Summer	Yellow	10	100
Dunja	Zucchini	Dark Green	12	83
Noche	Zucchini	Dark Green	15	73
Partenon	Zucchini	Dark Green	16	69
Costata Romanesco	Zucchini	Dark Green	19	58
Safari	Zucchini	Dark Green, stripes	15	47
Multipik	Summer	Yellow	23	39
Tigress	Zucchini	Light Green	14	29
Magda	Zucchini/Cousa	Light Green	18	28
Spineless Perfection	Zucchini	Light Green	15	27
Total Eclipse	Scallop	Green	11	27
Floridor	Round	Yellow	24	8
Plato	Zucchini	Dark Green	14	7
Geode	Round	Light Green	16	6
Zephyr	Summer	Yellow/Green blossom end	21	0
Yellow Crookneck	Crookneck	Yellow	17	0
Peter Pan	Scallop	Light Green	14	0
Bush Baby	Zucchini	Dark Green, stripes	14	0
Sunburst	Scallop	Yellow	9	0
Flying saucer	Scallop	Yellow/Green blossom end	7	0
Eight Ball	Round	Green	6	0

Previous trials have indicated that green zucchini are most likely to produce fruit without any pollination. These results agree with that with one major exception. Golden Glory, a yellow summer squash, produced large, marketable fruit from every bagged flower.