

## OC6. Effects of Pellet Seeds for Labour Saving on Thinning in Sesame

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### Objectives

This study was conducted to find out the way for labour saving on hand thinning operation using pellet seeds in the culture of sesame.

### Materials and Methods

- Variety : Ahnsankkae
- Treatments

Soil microorganism : Inoculated, Non-inoculated

Size of pellet : Small(0.012g, rice grain), Medium(0.021g, mungbean grain), Large(0.048g, soybean grain)

Numbers of grain planted : 2/hill, 5/hill

### Results and Discussion

Labouring hours of hand thinning was heavy similar with planting and essential process on PE film mulching cultivation of sesame even under newly developing integrated mechanization. Pellet seeds of small and medium with two pellets seeding per hill under black vinyl culture could save labour of thinning completely : so make available for no more hand operation for thinning until harvest since after seeding.

Table. Labouring hours and growth characteristics of pellet seeds in sesame.

Treatment			Appearance(%)	Plant height (cm)	Length capsul set (cm)	No. branch /plant	No. capsules /plant	Phytophthora blight (%)	Lodging (%)	Degree growth *	Thinning (hrs/10a)	Yield (kg/10a)
Micro-organism	Pellet size	No. seeds/hill										
Control			87	90	43	2.5	23	9	11	5.0	25.6	31.3
Inno.	Large	2	71	98	49	2.7	32	7	13	4.3	0	33.0
Inno.	Large	5	73	100	45	2.7	29	9	17	5.7	16.7	28.2
Inno.	Medi.	2	77	98	49	2.6	30	12	15	5.0	0	32.4
Inno.	Medi.	5	88	99	48	2.5	30	10	12	6.3	15.5	31.5
Inno.	Small	2	67	98	50	4.2	34	8	18	5.0	0	33.5
Inno.	Small	5	82	95	48	2.8	29	8	9	5.7	17.8	34.7
Non I	Large	2	77	100	48	2.8	32	5	14	5.7	0	43.7
Non I	Large	5	83	100	50	2.8	34	6	12	5.7	17.2	39.7
Non I	Medi.	2	83	93	45	3.2	27	8	13	6.3	0	39.3
Non I	Medi.	5	95	104	46	2.6	22	12	16	5.0	21.1	31.4
Non I	Small	2	92	96	43	2.7	26	11	17	5.0	0	31.3
Non I	Small	5	92	99	46	2.7	27	12	13	5.7	18.3	31.7

\* Observation : Bad:1, Mid-bad:3, Midium:5, Mid-good:7, Good:9

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