

CLUSTER FRONT LINE DEMONSTRATION OF SUMMER OILSEED (2019-20)

1. **Name of KVK:** Rathindra Krishi Vigyan Kendra
2. **Year of establishment:** 1994
3. **Host Institution:** Visva-Bharati University, Santiniketan, Dist. – Birbhum, Pin. – 731235, West Bengal.
4. **Address of KVK:** Rathindra Krishi Vigyan Kendra, Palli Siksha Bhavana, Visva-Bharati, Sriniketan, P. O. – Sriniketan, Dist. – Birbhum, Pin. – 731236, West Bengal. Phone: 03463-264771, email: rathindrakvk@gmail.com, rathindrakvk@rediffmail.com

Performance of the demonstration:

A. Technical Parameters:

Sl. No.	Crop demonstrated	Existing (Farmer's) variety name	Existing yield (q/ha)	Yield gap (Kg/ha) w.r.to			Name of Variety + Technology demonstrated	Number of farmers	Area in ha	Yield obtained (q/ha)			Yield gap minimized (%)		
				District yield (D)	State yield (S)	Potential yield (P)				Max.	Min.	Av.	D	S	P
1	Summer-Sesame	Tilottoma	8.8	53	35	720	Summer -Sesame Var: G-2+ Herbicides pendimethalin as pre emergences @ 3lt/ha+ Micronutrient spray Boron-20 @2gm/lt water in 25 and 45 DAS	94	20	14.4	9.3	12.80	754	1142	55

B. Seeds of Improved Variety G-2 (Tilottoma) @ 6 Kg. /ha, Method of seed sowing: - Broadcasting, Application of herbicides. Pendimethalin @ 3 lit. / ha at 1- 3 DAS, Foliar Spray of Micro- Nutrients: - ZN EDTA @ 1 gm. / lit. of water at 25 and 45 DAS.

C. Economic parameters

Sl. No.	Variety demonstrated & Technology demonstrated	Farmers' Existing plot				Demonstration plot				Farmers' feedback
		Gross Cost (Rs. /ha)	Gross return (Rs. /ha)	Net Return (Rs. /ha)	B:C ratio	Gross Cost (Rs. /ha)	Gross return (Rs. /ha)	Net Return (Rs. /ha)	B:C ratio	
1	Sesame, Var- G-2 + Herbicide, Micronutrient Spray	16200	44000	27800	2.72	17400	64000	46600	3.68	Additional net return is Rs.18800/ha

D. Socio-economic impact parameters

Sl. No.	Crop and variety Demonstrated	Total Produce Obtained	Produce sold (Kg. /household)	Selling Rate (Rs. /Kg.)	Produce used for own sowing (Kg.)	Produce distributed to other farmers	Purpose for which income gained was utilized	Employment Generated (Man days / house hold)
1.	Sesame, Var- G-2 + Herbicide, Micronutrient Spray	25600 kg	170.00	50.00	Rest (102) is kept for extracting Oil and sowing seeds in the next season.	–	Payment for Labor bill, payment for irrigation, fertilizer and pesticide expenditures.	18

E. Pulse Farmer's perception of the intervention demonstrated

Sl. No.	Technologies demonstrated (with name)	Farmers' Perception parameters					
		Suitability to their farming system	Likings (Preference)	Affordability	Any negative effect	Is Technology acceptable to all in the group/village	Suggestions, for change/improvement, if any
1.	Sesame, Var- G-2 + Herbicide, Micronutrient Spray	Suitable to a large extent	Farmers prefer the new improved variety of sesame i.e. Savitri as the existing variety of local check Tilottoma gives a yield and takes more time than new variety Savitri.	New improved variety seeds are affordable. However other components of package of practices like herbicides, plant protection chemicals, micro-nutrients, chemical fertilizers, irrigations etc. are not at all affordable except a very few from the beneficiaries when the programme support would be withdrawn.	None	No, the improved variety and the technological supportive package of practices are acceptable to the partner farmers of the Cluster FLD; but other farmers are still apprehensive about the availability of seeds of the improved varieties and the market acceptance of these new improved varieties. The farmers are greatly concerned about the rising prices of inputs like herbicides, micro-nutrients etc. But a good demand of the crop in the market is found.	Availability of seeds should be ensured in time. Low cost quality herbicides and micro-nutrients should be encouraged for dissemination among the farming community. Proper irrigation facilities should be created by the Governmental agencies.

E) Specific Characteristics of Technology and Performance

Specific Characteristic	Performance	Performance of New Technology vis-a vis Local Check	Farmers Feedback
1. Duration	Satisfactory	New Technology: 95 days, Local check: 110 days	45% increase in yield was obtained through the new technology than local check. The new variety fetched more benefit in shorter duration i.e. additional net return Rs.16350/ha than local check which is very much encouraging for sesame cultivation in summer season instead of Boro rice.
2. No. of silique/plant	High	New Technology: 47 days Local Check: 35 days	
3. Colour of the seed	Attractive	New Technology: White Local Check: Brown	

F) Extension activities under FLD conducted till dates:

Sl. No.	Extension Activities organized	Date and place of activity	Number of farmers attended
1.	Audio Conference	27.04.2020 Rathindra KVK	
2.	Newspaper (Jana Darpan Agril. Newspaper)	24.05.2020 Rathindra KVK	

G. Sequential good quality photographs (as per crop stages i.e. growth & development)

Rathindra KVK Scientists at the Off-Campus Training Programme on the Cluster FLD Programme on Summer Oilseed



Photographs of Seed Distribution



Rathindra KVK Technology Agent Collecting Data at the Vegetative Stage of Sesame



Rathindra KVK Technology Agent collecting Data at the Flowering Stage of Sesame



Rathindra KVK Scientist collecting Data at the Maturity Stage of Sesame



Rathindra KVK Scientist collecting Data at the Harvesting Stage of Sesame



H. Details of budget utilization

Crop (provide crop wise information)	Items	Budget Received (Rs.)	Budget Utilization (Rs.)	Balance (Rs.)
Summer, Sesame, 2019-20	i) Critical input	1,00000.00	51,920.00	48,080.00
	ii) TA/DA/POL etc. for monitoring			
	iii) Extension Activities (Field day, training etc.)			
	iv) Publication of literature etc.			
Total		1,00000.00	51,920.00	48,080.00

I. List of Farmer under FLD (Crop wise)

Crop: - Sesame, Summer, 2019-20

Name of farmer	Father's name	Village	Block	Mobile No.	Email ID	GPS Coordinates (DDMMSS format)		Soil testin g done (Yes/ No)	Reco mme ndati ons based on soil test value	Brief techno logy interv ention	Variety	Seed quan tity used	Area sown (ha.)	Demo. Yield (q/ha)			Yi el d of lo ca l ch ec k q/ ha	% incr ease
						Latitude	Longitud e							H	L	A		

											Crop: Sesame , Var: G-2	6 kg /ha	20 ha.	14.4	9.3	12.80		
DEPAL I GHOSH	BINOY GHOSH	RUPPUR	BOLPUR SRINIK E TAN	73840873 74									0.2 6					
CHAN DRANI SAHA	LATE POFULO SAHA	RUPPUR	BOLPUR SRINIK E TAN	77975257 96									0.2 6					
KANA BANAE RJEE	ASHIS BANERJ EE	RUPPUR	BOLPUR SRINIK E TAN	94743076 13									0.2 6					
SAROS WATI GHOSH	PRADIP GHOSH	RUPPUR	BOLPUR SRINIK E TAN	62978226 53									0.2 6					
MOUS UMI MUKH ERJEE	BACHU MUKHE RJEE	RUPPUR	BOLPUR SRINIK E TAN	97351939 91									0.2 6					
SAMOL IDAS BOIRA GYA	SWOPO NDAS BOIRAG YA	RUPPUR	BOLPUR SRINIK E TAN	95636227 94									0.2 6					
TULSI LOHAR	MITHU LOHAR	RUPPUR	BOLPUR SRINIK E TAN	73840873 74									0.2 6					
REKHA LOHAR	BIPADT ARAN LOHAR	RUPPUR	BOLPUR SRINIK E TAN	77975257 96									0.2 6					
MELO NI RANI LOHAR	KESORE LOHAR	RUPPUR	BOLPUR SRINIK E TAN	62978226 53									0.2 6					
ASHA LOHAR	SUNIL LOHAR	RUPPUR	BOLPUR SRINIK E TAN	97351939 91									0.2 6					
TUMPA LOHAR	ARUP LOHAR	RUPPUR	BOLPUR SRINIK E TAN	95636227 94									0.2 6					

SUMIT RA LOHAR	HORICH ARAN LOHAR	RUPPUR	BOLPUR SRINIK E TAN	89265364 11															0.2 6
MAYA LOHAR	SATYAB AN LOHAR	RUPPUR	BOLPUR SRINIK E TAN	87590072 37															0.2 6
JHARN A LOHAR	SONA LOHAR	RUPPUR	BOLPUR SRINIK E TAN	97753942 73															0.2 6
HIRA MAJHI	SUDHIR	RAIPUR	BOLPUR SRINIK E TAN	62947127 22															0.2 6
KALPA NA MAJHI	KATTIC K	RAIPUR	BOLPUR SRINIK E TAN	83489669 48															0.2 6
CHAY ANA MAJHI	MADHU SUDAN	RAIPUR	BOLPUR SRINIK E TAN	74775108 40															0.2 6
APARN A MAJHI	BANAK A	RAIPUR	BOLPUR SRINIK E TAN	80015557 92															0.1 3
KALPA NA DHIBA R	SANAT	RAIPUR	BOLPUR SRINIK E TAN	96093841 36															0.2 6
RENUK A KARM AKAR	BISWNA TH	RAIPUR	BOLPUR SRINIK E TAN	73845333 76															0.2 6
LAXMI MARDI	SUNIL	RAIPUR	BOLPUR SRINIK E TAN	62974793 10															0.2 6
BINOY GHOSH	KESAB GHOSH	DOMDAM A	BOLPUR SRINIK E TAN	98005559 19															0.2 6
NISHIT H KUMA R GHOSH	LT. SANKAR PADA GHOSH	DOMDAM A	BOLPUR SRINIK E TAN	98006048 99															0.2 6

NARGI S KHATU N	ABDUR RAFIK MOLLA	SATTOR	BOLPUR SRINIK E TAN	96146494 72																0.2 6
SERIN A BIBI	SEKH EKRAM	SATTOR	BOLPUR SRINIK E TAN	86959820 46																0.2 6
LAILA BIBI	ABU HOSSAI N MALLIK	SATTOR	BOLPUR SRINIK E TAN																	0.2 6
FARID A BIBI	SEKH SANAT	KENDRA DANGAL	BOLPUR SRINIK E TAN	97753942 73																0.2 6
RADHI K MARDI	LIDA MARDI	RAYERPU KUR	BOLPUR SRINIK E TAN	86959820 46																0.2 6
ADRI MAL	SHISHIR MAL	PAIK PARA	NALHAT I-1	96359576 29																0.1 3
SUMI MOND AL	DEBESH RANJAN MONDA L	PAIK PARA	NALHAT I-1	97323522 12																0.2 6
KABUL I MOND AL	BIREN MONDA L	PAIK PARA	NALHAT I-1	83488397 00																0.1 3
SHUKT ARA MOND AL	MANISH RANJAN MONDA L	PAIK PARA	NALHAT I-1	97757914 61																0.2 6
MITHU MOND AL	DEBPRA SAD MONDA L	PAIK PARA	NALHAT I-1	62944087 17																0.2 6
FULU MAL	RAJKUM AR MAL	PAIK PARA	NALHAT I-1	74785409 55																0.2 6
SUMPI KONAI	RAJU KONAI	PAIK PARA	NALHAT I-1	70293081 54																0.2 6

CHOTO SUKAL HANSD A	LAKHIR AM HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	62953410 77															0.1 3
MANG AL HANSD A	BUDHA N HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	62978612 57															0.2 6
SUKU MARDI	LAKHAI HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	90645676 08															0.2 6
RABI HANSD A	HARU HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	90645676 08															0.1 3
CHOTO JITU HANSD A	SOM HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	96825660 64															0.2 6
DHAN A HANSD A	BATUL HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	89067228 10															0.2 6
RAGH U HANSD A	RUBAI HANSDA	BADHER DANGA	BOLPUR SRINIK E TAN	89067228 10															0.2 6
JAGAN NATH HAZRA	LT. PANKHI HAZRA	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	98008895 02															0.2 6
SRIKA NTA PANDI T	LT. TARAPA DA PANDIT	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	96478863 28															0.1 3
PABIT RA KUMA R PANDI T	LT. TARAPA DA PANDIT	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	81015164 78															0.1 3

RAMC HAND RA KONR A	AMIT KONRA	ALIABAD KHEJURD ANGA	BOLPUR SRINIK E TAN										0.2 6					
SAMIR PRAM ANIK	LT. SUDHIR PRAMA NIK	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	99333463 53									0.1 3					
KHETR ANATH GHOSH	LT. BASUDE B GHOSH	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	89266053 99									0.1 3					
DINAB ANDH UDAS	LT. GOPAL DAS	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	78639261 63									0.2 6					
SUDAR SHAN KHAN	LT. SACHIN ANDAN KHAN	KAMALA KANTAPU R	BOLPUR SRINIK E TAN	81489547 26									0.2 6					
SUDAR SHAN PANDI T	SANTOS H PANDIT	KAMALA KANTAPU R	BOLPUR SRINIK E TAN										0.2 6					
UDOY GHOSH	SISIR GHOSH	RAJATPU R	BOLPUR- SRINIK E TAN	86700766 81									0.3 9					
SURAJI T GHOSH	SHAKTI PADA GHOSH	RAJATPU R	BOLPUR- SRINIK E TAN										0.5 6					
MONI GHOSH	HABAL GHOSH	RAJATPU R	BOLPUR- SRINIK E TAN										0.6 5					
FATIK GHOSH	SISIR GHOSH	RAJATPU R	BOLPUR- SRINIK E TAN	79085172 55									0.2 6					
NAND AYANI GHOSH	MANOJ GHOSH	RAJATPU R	BOLPUR- SRINIK E TAN										0.2 6					

RATAN GHOSH	MOLAY GHOSH	RAJATPUR	BOLPUR-SRINIKETAN										0.33				
SHAKTI KUMAR MATEL	SHYAM APRASAD MATEL	RAJATPUR	BOLPUR-SRINIKETAN										0.13				
JOGAI HAZRA	NIRANJAN HAZRA	RAJATPUR	BOLPUR-SRINIKETAN										0.39				
LAKHU DAS	BIKASH DAS	RAJATPUR	BOLPUR-SRINIKETAN										0.26				

Sulazata Mandal

Signature of Senior Scientist & Head (Officiating)