NATIONAL FOOD SECURITY MISSION

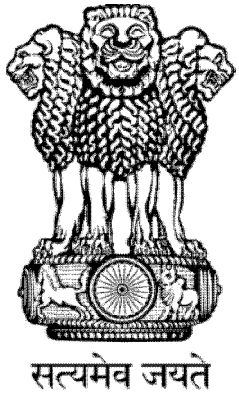
REPORT

OF

NATIONAL LEVEL MONITORING TEAM (NLMT)

(KHARIF, 2014)

MADHYA PRADESH



GOVERNMENT OF INDIA
MINISTRY OF AGRICULTURE (DAC)
DIRECTORATE OF PULSES DEVELOPMENT
BHOPAL (M.P.)

Contents

PREFACE

The Department of Agriculture and Co-operation, Ministry of Agriculture, Government of India vide order No. CPS 2-29/2014-NFSM dated the 31st July, 2014, constituted a National Level Monitoring Team (NLMT) for monitoring the National Food Security Mission (NFSM) activities in respect of the NFSM states, including Madhya Pradesh. The Team is comprised of experts in the field of Rice, Pulses and Coarse Cereals. The Terms of Reference (TOR) include i) The Director, Crop Development Directorate (CDD) to act as Convenor of the monitoring Team; ii) The NLMT to visit at least once in each Crop Season; iii) To conduct in-depth inspection of the developmental activities in accordance to approved Action Plan and to study the ñLocal Initiativesò; iv) The quantitative, qualitative and impact of the delivery mechanism would be studied, to be supplemented through visuals and video films; v) The analysed report will include concrete suggestions/recommendations for necessary Mid-Term Correction for better implementation of the Mission.

The composition of the NLMT for Madhya Pradesh was broad based and included the experts from Research organizations/SAUs. The Team also interacted with the Borlaugh Institute for South Asia (BISA), Jabalpur to understand the RCT and climate resilience agriculture for rainfed region of Madhya Pradesh, meetings with the farmers and Wrap-up Meeting with district Collector, being the Chairman of the District Food Security Mission Executive Committee (DFSMEC). The report has tried to capture the impact of NFSM during 11th Plan period in comparison to pre-NFSM five year Plan (10th Plan). The observations and recommendations have been categorized under broad heads.

I am thankful to the Members of the NLMT for having spared their valuable time and intensive field visits and their inputs to summarize the report outcome. Sincere thanks are also conveyed to the Missionôs Administration in the Deptt. of Agriculture and Cooperation, New Delhi for their sustained guidance and support. Technical Team of the Directorate of Pulses Development, Bhopal deserve appreciation in bringing out the report publication.

Bhopal (M.P.)
10th November, 2014

A.K.Tiwari
Convenor

ABBREVIATION

1. ATMA ï Agriculture Technology Management Agency
2. BISA ï Borlaug Institute for South Asia
3. CDDs ï Crop Development Directorates
4. CIAE ï Central Institute of Agriculture Engineering
5. CIPHET ï Central Institute of Post-Harvest Engineering and Technology
6. CHCs ï Custom Hiring Centre
7. CSBD ï Cropping System Based Demonstration
8. DFSMEC ï District Food Security Mission Executive Committee
9. FLD ï Front Line Demonstration
10. FPOs ï Farmers Producer Organizations
11. HYV ï High Yielding Varieties
12. ICAR ï Indian Council of Agricultural Research
13. IGKVV ï Indira Gandhi KrishiVishvaVidyalaya
14. IPM ï Integrated Pest Management
15. KVK ï KrishiVigyan Kendra
16. MARKFED ï MP State Agriculture Marketing Federation
17. MIDH ï Mission for Integrated Development of Horticulture
18. MPSSC ï Madhya Pradesh State Seed Corporation
19. NMAET ï National Mission on Agricultural Extension & Technology
20. NFSM ï National Food Security Mission
21. NFSMEC ï National Food Security Mission Executive Committee
22. NGOs ï Non Governmental Organization
23. NLMT ï National Level Monitoring Team
24. NMOOP ï National Mission on Oilseed & Oilpalm
25. NMSA ï National Mission for Sustainable Agriculture
26. NSC ï National Seed Corporation
27. PACs ï Primary Agriculture Co-operative Society
28. RCT ï Resource Conservation Technology
29. SAUs ï State Agriculture University
30. SDA ï State Department of Agriculture
31. SFSMEC ï State Food Security Mission Executive Committee
32. SRI ï System of Rice Intensification

REPORT OF NATIONAL LEVEL MONITORING TEAM TO REVIEW THE IMPLEMENTATION OF NATIONAL FOOD SECURITY MISSION (RICE, PULSES, COARSE CEREALS AND COMMERCIAL CROPS) IN THE STATE OF M.P. DURING KHARIF 2014 .

1. Background

1.1 The Centrally Sponsored Scheme of Crop development programme on National Food Security Mission for 03 commodities (viz. Rice, Wheat and Pulses) was launched during the 11th five year plan (2007-08 to 2011-12) with the objectives to achieve additional food-grain production consisting of Rice, Wheat & Pulses by 10, 8 and 2 million tonnes respectively by the terminal year of Eleventh Plan. With the critical interventions on demonstrations of improved package of practices, SRI and Hybrid Rice Technology, Seed etc., the envisaged targets of 20 million tonnes of food-grain was achieved.

1.2 Along with the other four Missions, viz. NMAET, NMSA, NMOOP & MIDH, the revamped NFSM, cleared by Cabinet Committee on Economic Affairs, has been continued during the 12th five year plan 2012-13 to 2016-17 with an allocation of Rs. 12350 Crores. The revamped NFSM, however, became operational from 2014-15.
The NFSM during Twelfth Five Year Plan (2012-13 to 2016-17) have five components viz. NFSM- Rice, Wheat, Pulses, Coarse Cereals and Commercial Crops (Sugar, Jute, Cotton) from 2014-15, has targeted an additional production of 25 million tonnes of food grains consisting of Rice-10 million tonnes, Wheat- 8 million tonnes, Pulses- 4 million tonnes & Coarse Cereals-3 million tonnes.

1.3 **The basic strategy** of the Mission is to promote and extend improved technology package. The interventions include organisation of Cluster Demonstrations, including 30% of total demonstrations under Cropping System Based Approach focusing *low productivity* and *high potential districts* by SDA with technical backstopping of ICAR/SAUs/ on Rice, Wheat, Pulses; distribution of certified HYV seeds/Hybrid seeds, RCT tools, irrigation machineries/MIS, trainings and undertaking local initiatives to the tune of 5% of total budgetary allocation to improve productivity.

1.4 The NFSM strategy further emphasise has to targeting reclamation of problematic soils, water logging areas and mitigation of adverse effect of climate change for high productivity areas, value chain integration (FPOs), and assistance for Custom Hiring Centre (CHCs).

2. Area of operation

S.No.	Commodities	All India		(No. of districts)
		No. of States	No. of District	
i.	Wheat	11	119	16
ii.	Pulse	27	607	51
iii.	Rice	24	199	8
iv.	Coarse cereals (Maize, Small Millet, Pearl Millet etc.)	26	182	16
v.	**Commercial Crops** (Cotton ,Sugarcane, Jute)	13 12 08		10 8 -

3. Monitoring Mechanism

S.No.	Level	Formation	Mission structure/ (Composition)	Frequency of Meeting
i.	National	i) General Council (GC)	Union Minister of - Chairman Agriculture Mission Director - Member Secretary	6 Monthly
		ii) National Food Security Mission Executive Committee (NFSMEC)	Secretary (A & C)- Chairman Mission Director - Member Secretary	Quarterly
		iii) National Level Monitoring Team (NLMT)	Director CDDs- Convener Principle Scientist/ SMD NFSM ï Member	Once in a crop season
ii.	State	State Food Security Mission Executive Committee (SFSMEC)	Chief Secretary ï Chairman State Mission Director - Member Secretary	6 Monthly
iii.	District	District Food Security Mission Executive Committee (DFSMEC)	District Collector/CEO- Chairman Jila Parishad DDA/DAO- Member Secretary	Quarterly

4. NLMT of MP : Composition

S.No.	Organization	Names and Designation
i.	Government of India (Department of Agriculture & Cooperation) Ministry of Agriculture **Directorate of Pulses Development** Vindhyachal Bhavan, Bhopal, (M.P.).	Dr. A.K. Tiwari Director (I/c) - (Convenor/Team leader)
ii.	Department of Entomology College of Agriculture, IGKVV, Raipur, (Chhatisgarh).	Dr. Sanjay Sharma Principal Scientist (Entomology) (Principal Investigator AICRIP Rice) - (Member)
iii.	SG College of Agriculture & Research Station, Jagdalpur IGKVV, Raipur, (Chhatisgarh).	Dr. Adikant Pradhan Scientist (Millets) - (Member)
iv.	RAK College of Agriculture, Sehore RVSKVV, Gwalior, (Madhya Pradesh).	Dr. R.P. Singh Senior Scientist (Agronomy) (Project in-charge AIRCP on MULLaRP RAK College of Agriulture, Sehore) - (Member)
v.	Government of Madhya Pradesh Deptt. of Farmers Welfare and Agriculture Development State Institute of Agriculture Extension & Training Barkhedi Kala, Bhopal.	Shri Ashok Kumar Ingle Joint Director (NFSM) - (Member)

5. State Profile: MP

Agro-climatic zones	(Nos.)	11
Net Cultivable area	(lakh) (2011-12)	153.39
Fallow land	(lakh ha) (2011-12)	9.58
Area sown	(lakh ha) (Kharif, 2013)	124.65
	(Rabi, 2013-14)	112.15
Double Cropped Area	(lakh ha)	83.41
Cropping Intensity	(%)	154.37
Gross Area under Irrigation	(%) (2011-12)	36.38
Rainfed Area	(%)	63.62
No. of Holdings	(lakh) (2005-06)	79.08
No. Holdings with SMF	(lakh) (2005-06)	53.47 (68%)
Area with SMF	(lakh ha) (2005-06)	46.63 (29.16%)
Power Consumption	(KW/ha)	1.36

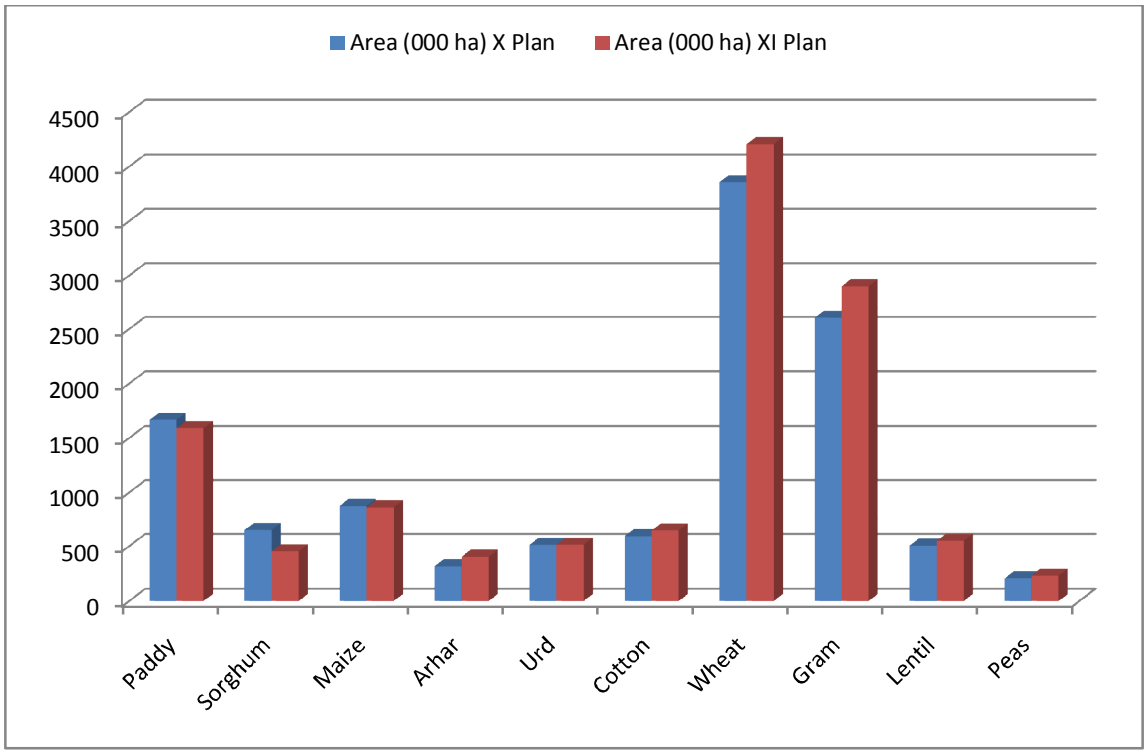
6. MAJOR CROPS

6.1. Production Scenario: Plan analysis (X-XI Plan)

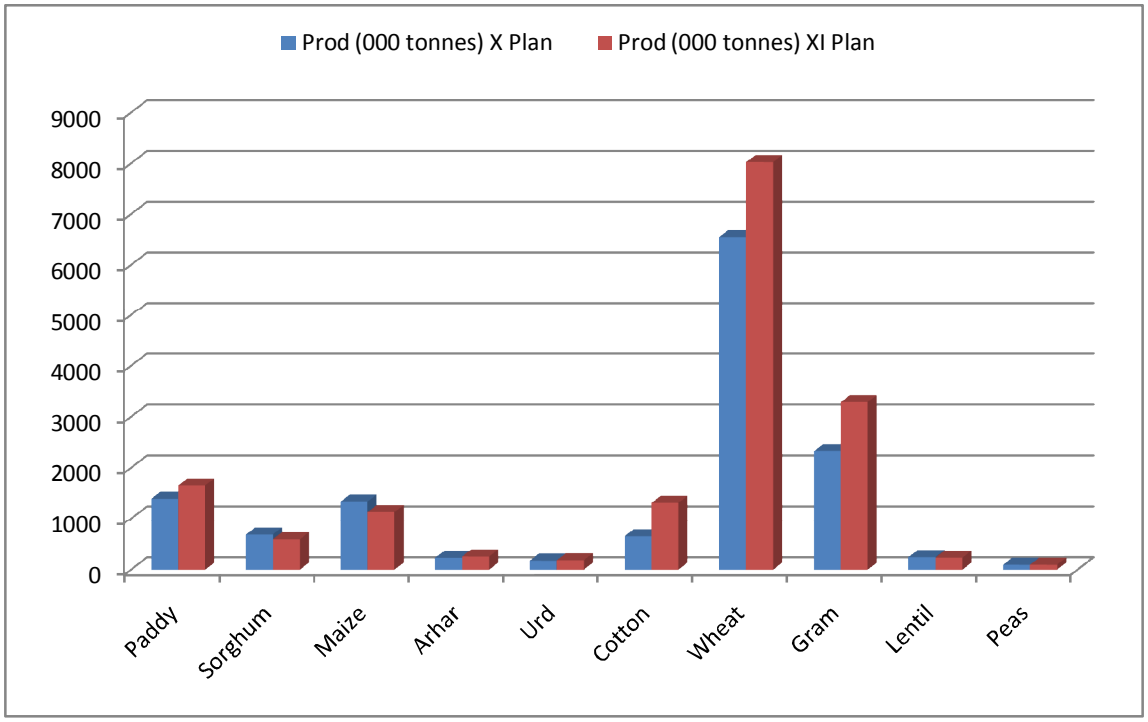
(Area Lakh ha, Prod. Lakh tonnes, Yield kg/ha)

Crop	State	X Plan			XI Plan					Increase/decrease over X plan (%)		
		A	P	Y	A	% cont.	P	% cont.	Y	A	P	Y
Kharif Crops												
Paddy	M.P	16.68	13.95	836	15.906	6.5	16.56	3.1	1041	-4.7	18.7	24.5
	India	**218.00**	**442.50**	**2030**	**243.84**		**527.15**		**2162**	**11.8**	**19.1**	**6.5**
Sorghum	M.P	6.48	6.79	1049	4.54	14.8	5.89	17.6	1297	-29.8	-13.3	23.5
	India	**40.61**	**41.78**	**1029**	**30.65**		**33.38**		**1089**	**-24.5**	**-20.1**	**5.9**
Maize	M.P	8.78	13.40	1527	8.65	12.6	11.32	7.6	1309	-1.47	-15.5	-14.3
	India	**65.76**	**114.39**	**1740**	**68.36**		**149.29**		**2184**	**3.9**	**30.5**	**25.5**
Arhar	M.P	3.18	2.32	729	4.06	10.7	2.56	9.6	632	27.6	10.6	-13.3
	India	**35.07**	**23.88**	**681**	**37.89**		**26.64**		**703**	**8.0**	**11.6**	**3.3**
Urd	M.P	5.14	1.76	342	5.15	22.5	1.83	16.9	354	0.3	3.8	3.5
	India	**25.06**	**9.98**	**398**	**22.94**		**10.81**		**471**	**-8.4**	**8.3**	**18.3**
Moong	M.P	0.82	0.26	323	0.83	3.1	0.27	2.6	328	0.9	2.6	1.6
	India	**26.19**	**8.79**	**336**	**26.41**		**10.49**		**397**	**0.8**	**19.3**	**18.3**
Cotton	M.P	5.92	6.46	1091	6.44	6.1	13.15	4.7	2041	8.9	103.7	87.0
	India	**83.75**	**159.82**	**1908**	**104.73**		**280.76**		**2681**	**25.0**	**75.7**	**40.5**
Rabi Crops												
Wheat	M.P	38.59	65.49	1697	42.07	14.7	80.26	9.5	1908	9.0	22.5	12.4
	India	**265.30**	**703.43**	**2651**	**283.36**		**843.62**		**2946**	**7.9**	**19.9**	**11.1**
Gram	M.P	26.04	23.26	893	29.04	35.3	32.90	42.7	1133	11.4	41.4	26.9
	India	**68.18**	**54.71**	**803**	**82.18**		**77.02**		**937**	**20.5**	**40.8**	**16.8**
Lentil	M.P	5.06	2.43	481	5.50	37.6	2.33	24.3	424	8.8	-4.0	-11.8
	India	**14.44**	**9.53**	**660**	**14.64**		**9.60**		**656**	**1.4**	**0.7**	**-0.6**
Peas	M.P	2.08	0.96	463	2.34	32.7	0.96	15.5	412	12.3	-0.1	-11.1
	India	**7.40**	**6.89**	**931**	**7.15**		**6.21**		**868**	**-3.3**	**-9.9**	**-6.8**
Sugarcane	M.P	0.51	21.63	42448	0.68	1.4	28.07	0.7	41023	34.3	29.8	-3.4
	India	**42.94**	**2790.05**	**64967**	**47.14**		**3257.87**		**69118**	**9.78**	**16.8**	**6.4**

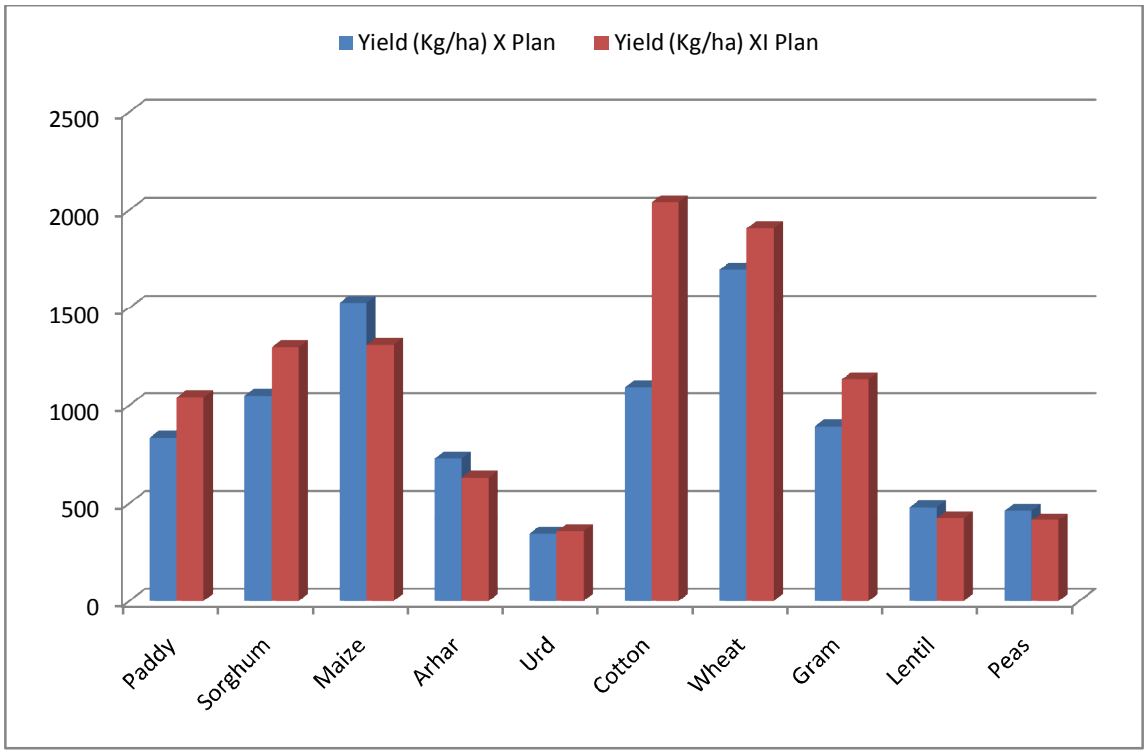
The comparative analysis of the two Plan period reveal that the NFSM launched during 11th Plan has paid dividends in the productivity of Paddy which was 24% higher during the 11th Plan (2007-08 to 2011-12) over its previous five year Plan. Similarly, the productivity of wheat was also increased to 1908 Kg/ha during 11th Plan from the 10th Plan productivity levels of 1697 Kg/ha i.e. more than 12% increase. A quantum jump has been recorded under gram where a productivity level of 1133 Kg/ha could be realized over the 10th Plan productivity of 893 Kg/ha which is approx. 27% increase. It is relevant to mention that the gram productivity during 11th Plan in the state of Madhya Pradesh was higher than the all India levels of 937 Kg/ha. The other cereals and commercial crops were not the part of NFSM during 11th Plan.



Crop coverage: Pre-NFSM (X Plan) and during NFSM (XI Plan) in M.P.



Production: Pre-NFSM (X Plan) and during NFSM (XI Plan) in M.P



Yield: Pre-NFSM (X Plan) and during NFSM (XI Plan) in M.P.

6.2. Crop Scenario: (2013-14)

Sr.No.	Crop	Area (lakh ha)		Production (Lakh tonnes)		Yield (Kg/ha)	
		DES	CLR	DES	CLR	DES	CLR
1.	Paddy	19.34	19.30	27.81	53.61	1438	2789
2.	Sorghum	2.31	2.55	2.88	3.73	1247	1500
3.	Maize	10.03	8.46	15.10	14.87	1506	1772
4.	Arhar	4.85	4.64	4.63	3.32	955	713
5.	Urd	5.58	5.92	2.07	2.22	372	576
6.	Moong	1.07	0.99	0.36	0.43	339	385
7.	Cotton	6.21	5.14	18.50	10.89	506	360
8.	Wheat	57.92	59.76	139.28	155.23	2405	2602
9.	Gram	34.82	31.60	38.17	25.55	1096	809
10.	Sugarcane	0.71	0.73	33.10	36.10	46621	49452

Source-DES, M/A (IV Adv. Est.) / CLR-State

6.3. Crop Coverage Kharif and target Rabi, 2014-15

Sr.No.	Crop	Area (lakh ha)		Production (Lakh tonnes)		Yield (Kg/ha)	
		Target	Achi.*	Target	Achi.*	Target	Achi.*
	Kharif						
1.	Paddy	20.00	18.91	50.00	31.46	2500	1664
2.	Sorghum	2.50	1.99	5.00	2.15	2000	1080
3.	Maize	11.00	9.30	35.20	19.41	3200	2087
4.	Arhar	5.50	4.41	6.88	4.48	1250	1015
5.	Urd	7.00	7.47	4.20	3.63	600	486
6.	Moong	1.25	1.17	0.75	0.50	600	422
7.	Soybean	66.00	54.63	95.25	60.03	1450	1099
8.	Groudnut	2.25	1.55	4.05	1.59	1800	1025
9.	Cotton	6.50	5.64	8.13	5.16	1250	914
10.	**Total Kharif**	**130.20**	**111.74**	**220.65**	**133.86**	**1695**	**837**
	Rabi						
11.	Wheat	60.00	-	219.00	-	3650	-
12.	Gram	36.00	-	54.00	-	1500	-
13.	Lentil	6.00	-	4.80	-	700	-
14.	Peas	3.50	-	3.50	-	1000	-
15.	Rapeseed/Mustard	8.50	-	13.60	-	1600	-
16.	Sugarcane	0.90	-	5.22	-	5800	-
	Total Rabi	**117.65**	**-**	**303.59**	**-**	**2580**	**-**

***- 1st Estimates, CLR, MP**

The less achievement under kharif crops are attributed to delayed monsoon and deficient rains in 29 districts of the state.

7. Financial Progress

7.1. Allocation & Expenditure : (2013-14)

(Rs. in Lakh)

S.No.	Name of Crop/ Scheme	Unspent Balance as on 1.04.13	Provision	Total release	Available Amount	Expenditure	Unutilised
1	Paddy	98.74	1426.23	1350.40	1449.14	1185.50	263.64
2	Wheat	599.88	6605.97	4748.05	5347.93	4535.76	812.17
3	Pulses	517.16	12243.95	11698.17	12215.33	10409.81	1805.52
4	Addln.Pulses	0	12973.00	12973.00	12973.00	11098.48	1874.52
5	A3P	156.97	5960.40	5837.46	5994.43	5554.76	439.67
Interest accured in year 2013-14							310.71
	Total	**1372.75**	**39209.55**	**36607.08**	**37979.83**	**32784.31**	**5506.23**
6	Publicity	28.52	0.00		28.52	23.00	5.52
	Total	**1401.27**	**39209.55**	**36607.08**	**38008.35**	**32807.31**	**5511.75**

Details of physical and financial progress is at Annexure –II.

7.2. Allocation & Expenditure Kharif: (2014)

(Rs. in Lakh)

S. No.	Name of Crop/ Scheme	Unspent Balance as on 1.04.14	Allocation	Release	Expenditure (upto Sept.)
1	Paddy		1926.18	963.09	130.20
2	Wheat		6924.45	3462.13	0.00
3	Pulses		17477.36	8912.18	526.65
4.	Coarse Cereals		1536.00	768.00	81.37
5.	Commercial- Cotton		70.03	41.86	2.25
	Sugarcane		20.80	12.43	0.00
	Total		**28301.82**	**14159.69**	**740.47**

Details of physical and financial progress is at Annexure –III

8. Details of field visit/ Activities

Districts of Jabalpur, Katni and Mandla of Madhya Pradesh were visited from 29th September to 1st October, 2014. Team also have Wrap-up meeting with District Collector.

S.N.	District	Block	Village/Institute	Activities
1.	Jabalpur	Jabalpur	Tewar	i) Kisan Goshti/ Farmerôs Interaction ii) Implement- Seed Drill
			Sehoda Panchayat	i) Farmerôs Interaction ii) Pigeonpea Demonstration (UPAS-120)
			Borlaug Institute for South Asia Centre (BISA), Jabalpur	i) Interaction with Scientist on RCT/DSR
			Gadar-Pipariya	i) Hybrid Rice Demonstration
			Sahajpuri	i) Implement beneficiaries (Rotavator & Straw Reeper- RKVY- PHT)
2.	Katni	Bahori-Band	Bheda	i) Cluster demonstration of Hybrid Rice (US-382) ii) Farmerôs Interaction iii) Implement beneficiaries (Conoweeder)
			Kudan, Lalpur, Rampur	i) Moong Cluster Demonstration (TMV-37)
		Bahori-Band	Bahori- Band SADO office	i) Kisan Goshti ii) Krishi Mahotsav (Kisan Rath)
3.	Mandla	Bija dadi	Muhiyanala	i) Hybrid Paddy ii) SRI System (KPH-199)

			Udaypur	i) Pulse Demonstration (Pigeonpea-ICPL-88039)
			Ramtila	i) DSR (WGL-32100)
		Narayan Ganj	Kudamaily	i) Kisan Goshti ii) Kisan Rath Yatra/ Krishi Mahotsav (24 Sep. to 20 Oct.)
			Mangal Ganj	i) DSR (WGL-32100) ii) SRI System (KPH-199)
			Bhawal	Barnyard Millet Demonstration (Sawa)
			Gujarsani	
		Mandla	Bineka Amanala	i) Hybrid Maize Demonstration (BKH-7074)
			Bakshera Duna	i) DSR (WGL-32100) ii) SRI System (KPH-199)
			Shilpuri	Demonstration of i) Kodo (Small Millet) ii) Kutki (Little Millet) iii) Ragi (Red Millet) iv) Sawa (Barnyard Millet)
		Narayan Ganj	Kondra	i) Interaction with MAPWA SHGs ii) SRI Demonstration iii) Pigeonpea Demonstration iv) Implement beneficiaries (Motor-Pump /Sprinkler set.)

9. State's Demonstration guidelines (*Input delivery mechanism)* Kharif 2014

As per the states guidelines vide No./B-8/8/2014/14-2 Govt. of MP, Mantralaya/ dated 16th May 2014 **(*Annex-A*)**, the clusters have to be organised within 10 km. along the highway including 2-3 villages. Minimum area of demonstration per farmer is 0.4 hectares upto maximum of 2 hectares.

9.1. The input arrangement (certified seeds, micro-nutrients, PP chemicals), as per recommended package of practices, were directed to be made available with PACS through appropriate orders to be issued from Co-operative Banks.

9.2. Designated agency for certified seeds MPSSC, Seed Federation, NSC; MARKFED to arrange micro-nutrients. The *Plant Protection (PP)* chemicals were advised to be directly procured from registered pesticide dealers by identified beneficiaries, to be reimbursed directly in farmers account.

9.3. Bench mark survey of the demonstration area and crop cutting experiment/outcome analysis has to be done by ATMA partner/SAUs/Department of Agriculture.

9.4. The crops demonstrated were compulsorily advised to be registered with Seed Certification Agency for utilising the certified seed for next season.

9.5. The guideline for Rabi 2014-15 has however been modified vide No. B-8/8/2014/14-2 Govt. of MP, Mantralaya/ dated 28th September 2014 advocating the delivery mechanism by State Extension personals **(*Annex-A*+)**

10. Prescribed input cafeteria for cluster demonstration is at ***Annexure- B***. Details on status of SFSMEC meeting, PMT, State monitoring mechanism, targets and achievement under pulses, paddy and coarse cereals, stateôs SRR, soil testing labs/soil health card and progress under micronutrient application, soil amelioration, farm implements, efficient water application tools during 2012-13 to 2013-14 are at **Annex-C**. It also includes endemic areas (districts under plant protection).

11. Observations

11.1. Coverage during kharif 2014 and likely production prospects are given at Para No.6.3. However, transplanted rice and DSR have been badly affected by delayed and deficit rains (>50%) during kharif season in the visited districts. To combat such situations, adaption strategies viz. supplemental irrigation facility, short duration cultivars and timely sowing of rice is highly recommended for harvesting good yield.

11.2. **Rice**

11.2.1. Old rice varieties like *IR 36* and *landraces* are being replaced by farmers with high yielding hybrid rice *US 382***.** Similarly, new rice varieties like R1 (Rajeshwari) and R2 (Durgeshwari) of IGKVV, Raipur, introduced during 2012 in Mandla region are gaining popularity. The crop stand of transplanted rice hybrid 199 was also found satisfactory.

11.2.2. MTU 1010 is midland farming variety but it was put under lowland situations under NFSM demonstration. The state, based on the experience should shift it to proper farming situations as per crops requirement.

11.2.3. Hybrid rice 6444 is taken in large area, expecting 30 q/acre yields. Here the farmers concern on restricted procurement per unit area need a consideration as hybrid growers may be discouraged by limitation in purchasing system.

11.2.4.WGL 32100 rice variety with seed as-input provided under poor soil depth, up land situation for the DSR demonstration, is not suitable such situation. In-fact, as per the land situation proper crop planning and selection of short duration improved paddy or other crop cultivar with complete package should have been planned. Hybrid cultivars should be demonstrated under advanced and resource rich eco-situation following the basic principles of soil/moisture conservation in light soils, rainfed and plateau zone.

11.2.5. The Direct Seeded Rice (DSR) is observed with a severe problems of common weed wild rice (*Sadwa*) mixture, which matures prior to ripening/ harvesting of main rice resultantly its seeds shatters in the field and germinated again in next kharif.

11.2.6. Aromatic rice variety ñChhatriò may be grown through organic farming and these farmers may be linked with rice miller for export. Farmers are convinced about the advantage of SRI and other new techniques, sweet corn is produced in Katni at a large scale with marketing MOU with Reliance.

11.2.7. Transplanting of rice manually is becoming very expensive, equipments like paddy transplanter etc. need to be popularised.

11.3. **Pulses**

11.3.1. Interaction with large number of chickpea growers have revealed sufferings due to non-remunerative prices during 2013-14 @ Rs. 2300-2400 per quintal (against Rs.3100/Qtls MSP), in addition to crop loss in the preceding season due to excessive rains, insect/pest etc.

11.3.2. Farmers are switching over to second crop after Wheat. Moongbean during spring/summer, with critical irrigation, is the preferred option. Appropriate

variety /quality seeds and proper IPM techniques with availability and advocacy of quality pesticide remains a big issue to be addressed under NFSM.

11.3.3. In Katni district Moong demonstration with (Variety TMV-37) / only with single input seed @ 8 kg/acre was visited. The crop had heavy infestation of Yellow Vein Mosaic, Jassids, hairy caterpillar, Pod bug and Tiger beetle. The seed was broadcasted, none of the recommended package, nor technical advisory was followed to recommend IPM measures etc. in view of summer mung potential of more than 600 hectares in this area the custom hiring assistance under local initiatives should extended for line sowing through seed-cum-fertilizer drill.

11.3.4. Urdbean is cultivated without following recommended package of practices with very old variety T 9. New varieties like *KU 96-3, Pant U 30, RBU 38 and PDU 1* with recommended technology package should be the part of NFSM demonstration.

11.3.5. Traditionally the Paddyï Pea, Paddy-Chickpea, Paddy-Lentil cropping system of Jabalpur is shifted to Paddy-Wheat cropping system, is gaining popularity due to continuous occurrence of frost during last 3-4 years. Traditional cultivation of green pea is affected due to introduction of canal irrigation system in last 3-4 years.

It is suggested to demonstrate Paddy-Pulse rotation with recommended technology and varieties to maintain the sustainability of production system.

11.4. **Coarse Cereals -** Of the 03 district, Mandla, grows arhar, kodo millet and kutki. JK 439, JK 155 and JK 13 varieties of kodo millet are common under cultivation. Barnyard millet is cultivated by farmers without external input as it has character of climatic resilience and reference on low fertile soils.

11.5**. Extension Administration**

11.5.1. Against a provision of 03 State Level Consultants and 6 TAs, only 03 TAs are in position. At *District level* only 33 Consultants (sanctioned 50) and 84 (sanctioned 100) and TAs have been deployed. It is observed that generally these TAs are not

being utilized for field extension work. In visited districts except Mandla, none of the TAs or consultants are being deputed for field work, monitoring or laying out demonstration. They also lack technical knowledge (Agronomy/Soil/IPM/Variety etc.). Monitoring and quality technology transfer demonstrations are generally poor.

11.5.2. Lack of campaigning on NFSM, absence of demonstration display boards, banners, etc. Systematic documentation on cluster demonstration, Input use, Crop based technological skill training etc. have been a major observation in Jabalpur and Katni district. However these issues were well addressed in Mandla district.

11.5.3. Shortage of need based implements for tillage operations reflected on cultivation practices. Generally single box seed drills/ (using seed + fertilizer mixed together are in practice. RCT tools /machineries such as pipelines, sprinklers, electric pumps, rotavators, reapers etc. promoted under the NSFM have helped the farmers to increase the production. Custom hiring of implements is gaining popularity as hiring tractor with implements is easier and cost effective than maintaining a pair of bullocks throughout year. But simultaneously more demand during peak season limits this option owing to limited machineries available with villages. The strength the FIGs / SHGs may be good option to be explored at local levels.

11.5.4. Pre-Kharif and rabi season crop planning was lacking in Jabalpur and Katni districts planning. The Team appraised the DCs on this issue.

11.5.5. Chemical or eco-friendly weed management is most important but lack of knowledge poor extension work at this front is accumulating problems to this menace. Common used weedicides are 2,4-D, Bispyribac-sodium, Fenoxaprop-p-ethyl (whipsuper) in the area.

11.5.6. Wilt, a major constraint of pulses. The local farmers had informed about the Non-availability of micro nutrients in the local market, sub-standard pesticides etc. has been observed by the Team.

11.5.7. Execution, campaigning, and monitoring of the scheme is very good in Mandla, it was disappointing in Jabalpur and below average in Katni district. The overall state need much sensitivity especially at JD and DD level. The JD incharge of the

division in the larger interest of the farmers/scheme/state was expected to coordinating wrap-up meeting with Commissioner/ District Collector.

11.5.8. Active involvement of Staff appointed under this programme (Consultant and TA) is necessary for effective implementations of NFSM programme. Proper programme planning is required by involving Agriculture University in deciding the technologies to be demonstrated by considering socioeconomic status, availability of natural resources and marketing of produce. Training and visit component (crop based/season based training) need impetus, may also be included under this programme, the information of ongoing activities must also be displayed in the village Panchayat building.

11.6. **Quality of Demonstration -**During current Kharif (2014), cluster demonstrations under NFSM Paddy, Pulse and Coarse Cereals reported by the districts are only with the distribution of seeds, the other *input cafeteria* could not be made available to these cluster demonstration beneficiaries owing to Govt directives on purchasing of inputs by the identified farmers themselves through PACs registered pesticide dealers to be reimbursed later on with the production of vouchers and the delayed approval of relaxation of varieties beyond 10 yrs of notification to 15 yrs by 25th August, 2014 by GOI could not become useful as the Kharif sowings were nearing completion. ***The team, therefore, recommends not to consider these demonstrations as being actually performed/ or conducted and No funds under this head (for such demonstration) could be shown as utilized by the districts.***

Cluster demonstrations, with limited input management, conducted on paddy, maize, mungbean and pigeonpea, however, were found excellent in Mandla district.

11.7. **Clarity on CSBD -** The concept of Cropping System Based demonstration is not amply clear amongst the district/block level functionaries. The guidelines of organizing at least 30% demonstration under this category is with the very basic

objectives of targeting *problematic soils (saline/alkaline/acidic), water logging, mono-cropping and extremely rainfed areas* with poor mechanization/ no mechanization, therefore, seems to be defeated.

11.8 **Non-Participatory Approach**-The participation in cluster demonstration by NGO, KVK etc. are negligible or nil the terms recommends the participatory approach in organization of demonstrations. CSBD may also given to Extension Directorate of SAU to standardize the cropping pattern.

11.9. Team observed unavailability of early variety seeds, also the varieties within 10 years of notification in Paddy, Pulse and Coarse Cereals under NFSM.

11.10. The team also visited ñKrishi Rathòunder ongoing Krishi Mahotsav (Sept., 25th to Oct., 20th, 2014) in district Katni and Mandla and found that there was a good response from farmers.

12. Recommendations/Suggestions

12.1. Explore niche Areas

12.1.1. The NFSM-Pulses interventions may be pursued in the command areas to explore the potential of urd and mung. Similarly, the area and productivity potential of chickpea and lentil may be harnessed with suitable varieties and production. (*List of recommended varieties are at Annex-D*).

12.1.2. More attention also needs to be given to the traditional crops like coarse/minor millets. Cost of seed and weather condition do not favour to fieldpea and chickpea cultivation in Jabalpur area owing to strengthening of irrigation facilities (Bargi dam). The Jabalpur area urgently need new *field pea, chickpea, lentil varieties having resistance to disease* and climatic resilience for the region. The ICAR/SAU has to take a note of this.

12.1.3. Use of wilt resistant cultivars of pulses, inclusion of short duration variety of paddy to increase cropping intensity,seed treatment of pulses with *Trichoderma*,

mandatory follow-up of IPM in place of sole dependency on pesticides, is strongly recommended.

12.1.4. On Coarse Cereals /Millets, there is need of identification of niche areas, bridging yield gaps through availability of quality seeds of promising location specific varieties both grain and fodder varieties/hybrids; streamlining seed production ;listing the best management practices etc.;

12.1.5. Development of varieties/hybrids with better re-generative capacity under drought condition, breeding of millet varieties with high Omega-3 amino acids may be taken up by the ICAR/SAU.

12.1.6. Special focus on minor millets with wide publicity to capitalize the virtues of millets as C4 plants, nutritional superiority, amenability for climate change etc.

12.1.7. The marketing problems of Kodo & Kutki in the state need attention of the Government.

12.1.8. Harvesting, threshing and pre-processing (de-husking) of small millet being labour intensive, need attention of the CIAE/ CIPHET (ICAR) for development of suitable machines to help and reducing the cost of cultivation, output and value addition to fetch better prices.

12.1.9. District Katni (Bohariband block) has a wide scope of cultivation of Mungbean in Kharif and summer season. Improved varieties of mungbean viz. PDM 11, Pusa 9531, HUM 1and TJM 3 need to be popularised.

12.2. Standardization of Cropping System/Techniques:

12.2.1.*Cereal-pulse cropping system* in alternate year command or to gain soil fertility and sustainable production system, is highly recommended for the areas likely to be covered under command. The state and DFSMEC is advised to critically monitor the NRM issues and suggest cropping systems suited to the eco-system of the region on sustainable basis.

12.2.2.The SAUs may be advised to **''standardize the cropping system''** round the year, based on varietal selection, of *rice-fieldpea-wheat-moong/urd cropping* to accommodate the sowing time and management of crop duration based on the available agro-resources.

12.2.3. SRI cultivation technique of paddy, with varied AES in the state in 11 Agro-climatic Zones, need suitable modifications in consultation with the SAUs. The input cafeteria under cluster demonstration may also differ from one AES to other.

12.2.4. Irrigation is one of the difficult aspects in certain parts like Mandla due to no water up to 700 feet depth of bore. It requires impermeable water tanks to be constructed in low lying areas to conserve rain water and recycling of the water for cultivation. Watershed management programme and integrated farming system could be successful programme. It is essential to give District-wise need based technical plan for effective transmission of suitable production technologies and strengthening of NFSM activities.

12.2.5. Introduction of suitable high yielding varieties, introduction of soil and water conservation techniques, crop rotation, crop diversity, organic farming and introduction of mechanized farming is the urgent need for sustainable agriculture. Wild rice eradication, soil amendment, integrated pest management for insect, diseases & weeds are the production constraints lacking in the demonstration, it should be considered.

12.2.6. Farm visit of Borlaug Institute for South Asia (BISA) situated near Jabalpur, has given to understand that dry direct seeding, mechanized farming and zero tillage (Paddy, Maize) is demonstrated nicely, farmers may be made aware about these techniques by training and visit using NFSM interventions.

12.2.7. Hybrid maize was seen in upland which was dense and overlapped. Standard practices of agronomical measures such as line sowing, earthing up at 30 DAS with balance fertilizer doses etc need to be recommended by SAUs to realise the potential cob size and cob yield.

12.3. Guidelines

12.3.1. The Team has a critical observation on the guidelines of conducting the demonstrations which prescribes to organize the cluster demonstration in comparison to its control. The Team is of the opinion that neither it is followed nor it seems to be practically possible. It is therefore, suggested that suitable modification on this may be made in consultation with ICAR at the level of the Head Quarter.

12.3.2. Few new varieties under paddy and pulse have been introduced under NFSM, However, farmers and Extension workers still need more training to adapt these and other best performing cultivars. To ensure next time seed availability, of these varieties need strategic work plan at SFMEC and DFSMEC level such as breeder seed indenting, seed production compulsorily registration of cluster plots with SSC and Seed Rolling Plan. Varietal intervention is needed in view of poor VRR in case of pulses like Urd, Mung and Arhar as farmers still use age old varieties (more than 10 years) without knowing the suitability of land situation and locality.

12.3.3. Farmers are showing interest in adopting novel techniques in Agriculture. Mode of input availability and present system of govt. subsidy should be simplified, quality assurance of inputs and their availability should be provided in the form of demonstration kit. GPS data of beneficiaries plot may be given for all the field demonstration programmes in their respective official documents for its authenticity and verification.

12.3.4. *49% of total allocation towards seed distribution***,** also been observed at a very higher side in view of the non-availability of certified seeds of the varieties within permissible year (within 10 years). The NLMT therefore could not obtain the VRR of the state. *Thus, the NLMT recommends this % to be downsized at the level of 35%, the balance 14% may be diverted to RCT which would encourage mechanisation.*

12.3.5. The state Missionôs has suggested on inter-componental change flexibility at the level of 30% from the existing 20% so as to intervene on inter location specific requirements in a districts.

12.3.6. 10% limited (cap) allocation against total budget for machinery has been observed as scarce and defeat very purpose of farm mechanization and RCT. This should have been at least 20%.

12.3.7. On water carrying pipe, the existing subsidy rate @ Rs. 25 per meter has been requested to be enhanced in view of higher cost (one pipe-6 meter or 20 feet @ Rs. 650 per pipe), this should be brought to the level of @ Rs. 1500 per beneficiary.

12.3.8. Single box seed drills should be replaced by double box seed drill (Seed-cum-fertilizer drill). *Mixing of seed and fertilizer together in one box is common practice and not recommended as it may damage to seeds due to hygroscopic nature of fertilizers.*

12.4. Conservation Agriculture: Documentation

12.4.1. Potential increase in area under irrigation by way of intervention of efficient water application tools (Sprinkler, pipes, pump sets, rain gun) need to be compiled in order to evaluate the impact of these interventions. The subsidy benefits under the interventions of efficient water application tools, including 3 HP electric pump, is not given to farmers and need to be extended to all categories of farmers on pro-rata basis.

12.4.2. With introduction of Power Tiller, sowing machineries etc, there is need to Standardize existing more tillage practices by reducing high frequency of ploughings during rabi crops (@ Rs. 700/- per acre with one pass), which can easily be done away with one or two ploughings as reduced tillage and zero tillage (by zero till plough) in *Direct Seeded Rice- wheat cropping system*.

Even farmers prefer more tillage on chickpea and field pea for field preparation, as a part of conventional practice, need to be diverted to conservation agriculture.

12.4.3. Cost:Benefit ratio of rotavator, power tiller, paddy transplanter and other such high cost machineries should be worked out by state Directorate of Engineering/SAUs and documented alongwith best practices. These should be published under NFSM for further replication across the state/country.

12.5. Extension Administration

12.5.1. For wider publicity and long lasting impact of demonstrated activities (cluster/implements, variety) display of flexi boards both at village panchayat buildings and demonstration site, is highly recommended**.**

12.5.2. Herbicides (weedicides) are well known among farmers but with limited knowledge, the Team therefore recommends to organize a good number of

demonstrations on available herbicides use (other than regular) as continuous use of same herbicides create tolerance in weeds and hence replacement after every 2-3 years, should be the strategy under state NFSM plan.

12.5.3. None of the Cropping system Based Training has been observed in the visited districts except Mandla, the 4 session of such training under cluster demonstration should be stream lined, this need a serious monitoring.

12.5.4. The SFSMEC with the preoccupation of CS on other unavoidable issues, be chaired by APC (ACS level). Only one meeting against the desired two meetings (each crop season) could be organized.

12.5.5. The status of DFSMEC meetings and submission of proceedings to State nodal agency its follow-up also need a re-look. The whole concept of Missions Approach /Committee etc at the level of JD (Agri.), DDAs and District Collector give an image of routine age old demos/distribution of inputs and machineries.

12.5.6. The Team was deprived of his input during the visit in his Division and his HQ at Jabalpur. The team, however, proactively had a personal wrap-up meeting with DM, Jabalpur, Mandla and also with DM, Katni, over telephone. Deputy Commissioner Jabalpur could not be briefed due to communication gap at State Departmental level**.**

12.5.7. Bench mark surveys, cent percent soil testing of identified cluster plots, and timely availability of test report be ensured. Lacking these, it hampers the very purpose of applying micronutrients. Implements were given to farmers as Cono-weeder and SRI marker for using in fields. No conservation agriculture has been adopted for longer period of sustainability.

12.6. **Local initiatives**

12.6.1. Under local initiatives, active SHGs like one ñTejaswaniò in Mandla need to be supported for irrigation support, introduction of novel techniques of vegetable cultivation (plastic culture, drip irrigation etc.) and introduction of improved lac-cultivation techniques, BSMR-736 perennial variety of Pigeon pea both for consumption & stacking of vines of creeper vegetable and for fencing etc.

12.6.2. Shelves of *local initiatives*, specialized project, market support & value chain integration etc. which are nil. These are the activities which may emerge from DFSMEC and should be a part of the Annual Action Plan.

The shelves of *local initiatives may include* Redgram on rice bunds (AP, Telangana, CG), 2 % urea spray. Introduction of new varieties, distribution of winnowers, seed storage bins (AP, Telangana); construction of godowns, distribution of power tiller (CG); seed treating drum (Karnataka), dal mills (Nagaland), pulses in rice fallow (Odisha), Disc plough/harrow, tractor operated reaper, seed storage bins, spiral seed grader (Rajasthan), pulse hydrogel (TN), Mini dhal mill (WB) Farm pond with inlet/outlet (20x20x3m, 30x30x3m.), threshing yard, seed processor plant (MS) power weeder, battery operated sprayer (Punjab).

12.6.3. The other initiatives may include demonstration by NGOs (Karnataka, Mizorum, Nagaland), custom hiring assistance (land preparation, spraying, threshing) (AP, Telangana) ploughing, harrowing, threshing (MS), line sowing, threshing (Punjab).

12.6.4. The Team recommends that the wild Rice menace should be tackled at early growth stage to reduce impurity and competition with crops. Alternatively, violet coloured rice variety ñ*Shyamla*ò may be taken in cultivation for 2-3 years to eradicate wild rice menace which can easily be identified in early stage of growth due to colour. The state may undertake this activity under ñ*Local initiatives".*

12.6.5. Self Help Group of women ñMafuaò organizes the home agriculture and secondary agriculture, even the marketing of produces for securing family stability. These need support under local initiatives on transportation.

(Dr.A.K.Tiwari)	(Shri. A.K.Ingle)	(Dr. Sanjay Sharma)	(Dr. R.P.Singh)	(Dr. A.Pradhan)
Convenor	Member	Member	Member	Member

Farmers interaction: Kisan Gosti at Jabalpur District

Field inspection: Pigeonpea

Mechanization: Interaction with seed drill beneficiary

PRI Involvement: Meeting in Sehoda Panchayat

Paddy Demonstration

Awareness level: Interaction with demonstration benficiary

RCT: Interaction with beneficiary -Rotavator

Cluster demonstration at Katni District–Moong-Variety TMB 37

Efficient water application tools : Pipeline

Observing heavty infestion in moong Cluster demonstration at Bohari Band Block

Initiative: Krushi Mohatsav Kisan Rath at Katni (25.09.2010 to 20.10.2014)

Initiative: Krushi Mohatsav Kisan Rath at Katni (25.09.2010 to 20.10.2014)

Interaction with DDA, Mandla

TSP: Interaction at Paddy cluster demonstration

TSP: Paddy cluster demonstration

ANNEXURES

Annex-B

CAFETERIA OF INTERVENTIONS FOR CLUSTER DEMONSTRATIONS IN MADHYA PRADESH FOR 2014-15

(VIDE JNKVV LETTER NO. SA.AA.SE./S.B.N/ATMA/2014/673, DATED 28.06.2014)

A. RICE HIGH YIELDING VARIETIES (HYV)

(Per hectare) **Amount in Rs.**

S.No.	Name of Interventions	Recommendation of JNKVV Scientists	Total cost/hac.
1	Demonstration of potential of high yielding	Seed rate : Directed seeded rice - 60 Kg/ha ; Transplanted rice - 40 Kg/ha	**2000**
2	Seed treatment	Thirum @ 2g/Kg seed **or** Carbendazim 1.5 g + Streptocycline 2.5 g per 10 Kg seed.	**100**
3	**Micro nutrient**		
3.1	Zinc sulphate	Zinc: Zinc sulphate @ 25 Kg/ha as basal application for every three cropping sequence., 0.5 % foliar application of Zinc sulphate Nutrilize with 0.25 % lime in the event of symptoms of Zinc deficiency 2-3 spray at the interval of 10-15 days.	**900**
3.2	Blue green algae(BGA)	3 Kg of each inoculent should be taken.	**300**
		For transpanted rice	
		ñInoculants slurry to be prepared in 150 litre of water, Dip the roots of seedlings in the slurry for 10 minutes under the shade.	
		Inoculants seedling should be transplanted as early as possible.	
		Direct Seeded Rice	
		BGA should be mixed with 150 Kg well powered FYM/Compost/Vermi-compost soil.	
		Broadcast the mixture over one hectare before sowing.	
		Blue Green Algae	
		Soil based BGA inoculums @ 10Kg/ha for under Transplanted and DSR condition.	
3.3	Boron (Borox Deca hydrate, Borox Penta hydrates)	10 Kg Borex/ha strictly on soil test based recommendation (in Boron deficient soils).	**1000**
4	Demonstration on effectiveness of weedicide (appropriate and recommended)	**For direct seeded rice (DSR), Herbicide,** Butachlor 1.5 Kg a.i./ha (3.0 kg/ha.)	**750**
		Commercial product 2,4 D (Ethyl ester) 0.5 kg a.i./ha (1.33 kg/ha) or Bispyridac - Na 20 gm a.i./ha (0.2 kg/ha)	
5	IPM in rice including mechanical devices (manual sprayer and conoweeder) Manual Sprayer and conoweeder will be provided @600/unit	**Disease Control**	**1650**
		White tip of rice-1 spray of Carbofuran @ 1 ml/lit. 40 DAT	
		For sheath rot, sheath blight, false smut- Foliar spray of propiconazole 25 EC @ 1 ml. /lit. of water	
		Blast- Foliar spray-Tricyclazole 75 WP 0.6 gm/lit. of water	
		Bacterial Blight- Foliar Spray-Streptocycline @ 2.5 gm/10 lit. of water	
		Insect Control	
		Gundhi Bug- Carbaryl D @ 25 kg/ha	
		Stem Borer - Cartap hydrochloride 50 WP @ 20 kg/ha.	
6	Publicity material	**...**	**250**
7	Visit of Scientists	**...**	**300**
8	Field days	**...**	**250**
	Total	**...**	**7500**

Note:- 1. If seed is already treated, amount on seed treatment will not be used. 2. Above intervention may be changed region wise according to the availability of inputs.

B. **MILLET (COARSE CEREALS)**

(Per hectare) **Amount in Rs.**

S.No.	Name of Interventations	Recommendation of JNKVV Scientists	Total cost/hac. (Rs.)
1	Seed Including seed treatment	Seed rate 5-10 Kg/ha	500
		Seed treatment with Tricoderma viride + Carboxin 4:1 @ 5 g/Kg or Carboxin @ 2 g/Kg seed.	
		For Shoot Fly: Cholopyriphos @ 2 ml/Kg of seed.	
2	Promoion of line sowing	Same as recommended	650
3	Mocro nutrients (Zinc, boron, iron)	25 Kg. Zinc Sulphate /ha & Borex 10 Kg. /ha at the time of sowing	900
4	Weedicide (appropriate & recommended)	2, 4-D(Ethyl ester) 0.5 gm a.i./hg as post emergence (1.33 Kg/ha commercial product)	750
		Fenoxaphop 100 g a.i. /ha as post emergence (100 g/ha commercial production)	
5	Insecticides (Approximate & recommended)	For Stem borer: Carbaryl 85 % WP @ 5.75 Kg/ha.	500
6	Bio-fertilizer (Azotobacter, PSB, Potash mobilizing bacteria and zinc solubilizing bacteria)	**Azotobacter, Azosprillum and PSB**	300
		3 Kg of each inoculant	
		It should be mixed with 150 Kg well powered FYM/Compost/Vermicompost soil and inoculate in shade for 7 days before soil treatment (about 40 % moisture should be maintained).	
		Broadcast the mixture over one hectare land before sowing.	
7	Demonstration on IPM including mechanical devices (Manual sprayer @ 600/Unit)	Spray of Carnedazim (0.05%) alone or combination with captain Mancozeb (0.02%)	600
8	Publisity material	...	250
9	Visit of Scientists	...	300
10	Field Day	...	250
	Total		**5000**

Note:- 1. If seed is already treated, amount on seed treatment will not be used.
2. Above intervention may be changed region wise according to the availability of inputs.

C. MAIZE (COARSE CEREALS)

(Per hectare) **Amount in Rs.**

S.No.	Name of Interventions	Recommendation of JNKVV Scientists	Total cost/hac. (Rs.)
1	Demonstration of Hybrid Maize :- Intoducing newly released hybrid and quality protein maize varieties with specific to region	Seed rate 20 Kg/ha	950
2	Seed treatment (appropriate & recommended)	Seed treatment with *Tricoderma viride* @ 5 gm/Kg. of seed.	100
3	Zinc sulphate (21 %)	Zinc sulphate @ 25 Kg/ha is recommended as basal application for every three cropping sequences. If deficiency of zinc is appears on the standing crop, 0.5 % foliar application of Zinc sulphate is recommended (Netrilize with 0.25 % lime) two to three spray at the interval of 10-15 days are required.	900
4	Weedicide (appropriate & recommended)	Atrazine/Simazine 1.0 Kg a.i./ha as pre emergence (2.0 Kg/ha commercial production)	750
		2,4-D (Ethyl ester) 0.5 Kg a.i. /ha as post emergence (1.33 Kg/ha commercial production)	
5	Pesticide (appropriate & recommended)	Stem borer	600
		Carbaryl 85 % WP @ 1.75 Kg/ha.	
		Apply Trocoderma Chilonis @ 1.6 lakh/ha on 7 and 15 days old crops.	
		Shoot fly: Apply Phorate 10 % G @ 30 Kg/hac.	
6	Bio-fertilizer (Azotobacter, PSB, Potash mobilizing bacteria)	3 Kg of each inoculant should be taken	300
		It should be mixed with 150 Kg well powered FYM/Compost/Vermicompost soil and inoculate in shade for 7 days before soil treatment (about 40 % moisture should be maintained).	
		Broadcast the mixture over one hectare land before sowing.	
7	Demonstration on IPM including mechanical	Pheromone traps	600
8	Publicity Material	...	250
9	Visit of Scientists	...	300
10	Field Day	...	250
	Total		**5000**

Note:- **1. If seed is already treated, amount on seed treatment will not be used.**

2. Above intervention may be changed region wise according to the availability of inputs.

D. CROPPING SYSTEM BASED DEMONSTRATION: PULSES-WHEAT

I) PULSES **Per hactare** **Amount in Rs.**

S.No.	Name of Interventions	Recommendation of JNKVV Scientists	Total cost/hac. (Rs.)
1	**Popularization of improved varieties**		
1.1	Urd, Moong, Cowpea, Pigeonpea	Seed rate 20kg/ha	1800
1.2	Chick pea/Filed pea	Seed rate 80 kg/ha	
1.3	Lentil/Horse gram	Seed rate 40 kg/ha	
2.	Seed treatment Fungicides/ Molybdeoum		100
		Seed treatment with Trichoderma viride + Caqrboxin @ 5gm/Kg. Seed OR Carbendazim + Thirum (1:2) @ 3 g/kg seed	
		Pigeonpea - Seed treatment with Metalaxyl @ 3 g/kg seed and foliar spray of Metalaxyl @ 3 g/lit of water, at appearance of phyotopthora blight	
		Chickpea - Soil incorporation of *Trichoderma viride* @ 2.5 g/ha along with FYM.	
3.	**Micro Nutrients and bio - fertilizers**		
3.1	Zinc Sulphate	Zinc sulphate @ 25 kg/ha is recommended as basal application for every three cropping sequences. If deficiency of zinc is appears on the standing crop, 0.5% foliar application of Zinc Sulphate is recommended (Neutralize with 0.25 % lime) 2 to 3 spray at the interval of 10-15 days are required.	900
3.2	Boron (Borex Deca hydrate, Borex Penta hydrate)	10 Kg borex/ ha is recommended in boron deficient soils as basal application. If deficiency of boron is appears on the standing crop, 0.2 % foliar application of borex is recommended 2 to 3 sprays at the interval of 10-15 days are required.	1000
3.3	Rhizobium & PSB, Potash Mobilizing bacteria and Zinc solubilising bacteria	Specific Rhizobium, PSB & Tricoderma	300
		Rhizobium	
		• Crop should be inoculated with appropriate Rhizobial inoculant every year	
		• Seed should be treated first with fungicide as per recommendations	
		• Prepare a slurryof 1 Kg. of Rhizobium culture in 1 lit. of Jaggery solution (by dissolving 200 gm jiggery in 1 lit. of hot water and cool it)	
		• It found difficult to treat such a large quantity of seed than it should be divided in 3 to 4 part and accordingly inoculant slurry should also be divided	
		• Mix the inoculants slurry in shed with seed so that every seed should be coated well.	
		• Sow the inoculated seed as early as possible and do not keep the treated seed overnight.	
		PSB and Tricoderma	
		• 3 Kg. of each inoculants should be taken	
		• Mixed with 150 Kg. well powdered FYM/ compost/vermin compost (about 40 % moisture should be maintained.	
		• Broadcast the mixture over 1 hac. Land	

S.No.	Name of Interventions	Recommendation of JNKVV Scientists	Total cost/hac. (Rs.)
4.	Demonstration on use of Sulphur as a nutrient	40 Kg. Sulphur /hac.	10000
5.	Demonstration on use of weedicide (Appropriated and recommended)	• Pendamethalin 1 Kg a.i. /ha as per emergence (3.3 Kg/hac. Commercial product)	750
		• Imazethapyre 75 gm. A.i. /ha as post emergence (750 gm/ha Commercial product) except chickpea and lentil	
6.	Demonstration on IPM including mechanical devices	For disease control	850
		Mung, Urd- 2 foliar spray of Carbendazim (1 g/lit) at 15 days interval / spray neem oil	
		Pigeonpea- Foliar spray appearance of Phytopthora blight	
		Chickpea- Soil incorporation of *Tricoderma viride* @ 2.5 Kg. /ha along with FYM	
		For Insect control	
		Mung and Urd	
		i) Spray Dimethoate 30 EC @ 1.5 ml/lit in vegetative stage. Repeat the treatment at pre-flowering stage to check the incidence of sucking pest.	
		ii) For leaf feeder apply spray Quinalphos 25 EC @ 2.5 ml/lit.	
		iii) The use of yellow sticky traps, Pheroman traps, Light traps.	
		Pigeonpea	
		i) Profenofos 50 EC @ 2 ml/lit & 4 gm for Gram Pod borer	
		ii) Imadacloprid 17.8 SC @ 2 ml/lit for Pod Fly management	
		Chickpea	
		i) For gram pod borer apply HaNPV @ 250 LE/hac.	
		ii) Install Light trap (JNKVV Trap) with 160 V Mercury lamp or Install Pheromone Trap @ 20 /hac.	
7.	Publicity Material	...	250
8.	Visit of Scientists	...	300
9.	Field Day	...	250
	Total		**7500**

Note 1. If seed is already treated, amount on seed treatment will not be used.

2. Above intervention may be changed region wise according to the availability of inputs.

B- Wheat

S.No.	Name of Intervention		Total Cost /ha (Rs.)
1.	Demonstration on new HYV introducing newly released high yielding varieties with specific to region including seed treatment	Seed rate 100 Kg/hac	2200
2.	Use of gypsum/Phospho-gypsum/ bentonite sulphur	20 Kg /hac. Through gypsum (130 Kg)	500
3.	**Micro-nutrients and bio-fertilizer**		
3.1	Boron (Borex Deca hydrate, borex penta hydrate)	Boron: 10 Kg. Borex /hac. Is recommended in boron deficient soils as basal application. If deficiency of boron is appears on the standing crop/0.2 % foliar application of Borex is recommended. 2 to 3 spray at the interval of 10-15 days are required.	1000
3.2	Demonstration on use of chemical weedicide (Appropriate and recommended)	Metsulfuran ï 4.0 gm a.i. /ha as post emergence (20 g/hac. Commercial product)	750
		Pheoxoprop- P ï Ethyl 100 gm a.i. /ha as post emergence (1000 gm/hac commercial product)	
		2, 4-D (Ethyl Ester) 0.5 Kg. a.i. /hac. As post emergence (1.33 Kg. per hac commercial product)	
4.	Visit of Scientists	...	300
5.	Field Day	...	250
	Total		**5000**

Note:-

1. **If seed is already treated, amount on seed treatment will not be used.**
2. **Above intervention may be changed region wise according to the availability of inputs.**

Annex-C

Status of District Food Security Mission Executive Committee

1. Meetings

Year	Meeting held	Major decision
2013-14	20.05.2014	*Annexure-1*
2014-15	-	

2. Status of Consultants and Technical Assistants

Level	Project Management Support	Approved	In Position	Remark
State	Consultants	3	0	
	Technical Assistants	6	3	
District	Consultants	50	33	
	Technical Assistants	100	84	

3. Input Delivery Mechanism-

a) Input cafeteria for cluster demonstration is decided by SAUs. The State Agency MP State Cooperation & Marketing Federation (MARKFED) procure the input and store it with PACS. This Kharif 2014, the farmer were advised to procure the input from their own pocket and to get the reimbursement later on. But this system could not prove to be practical and the cluster demonstrations were badly affected.

4. Monitoring Mechanism

Level	Designation	percent	Status	
			Visited districts	State
Division	Joint Director Agriculture (Division)	1%	Not done	More rigorous monitoring required
Department	DDA (Agriculture)	5%		
Sub. Division	SDO (Agriculture)	10%		
	SADO (Agriculture)	50%		
	ADO (Agriculture)	100%		
	RAEO(Agriculture)	100%		

5. Demonstrations Target and Achievements year 2014-15

a) Sole crop cluster Demonstration. (Phy.-hac., Rs.-in Lakhs)

S.no	Crop	2014-15			
		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.
1	Pulses	82786	6208.95	11079	88.68
2	Wheat	27300	2047.50		
3	Paddy	8128	609.60	7207	66.17
4	Coarse Cereals	24320	1216.00	19834	70.17
	Total	**142534**	**10082.05**	**38120**	**225.02**

b) Cropping system based Demo. - Nil

6. Seed Distribution- High yielding Varieties/hybrids

(a) Target and Achievements.

S. No	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses	67090	970.00	56266	673.66	185650	2551	138664	1700.22
2	Wheat	140000	700.00	107983	539.91	240000	1200	117873	454.68
3	Paddy	15500	85.00	8264	40.49	22000	140	2948	11.55
	Total	**222590**	**1755**	**172513**	**1254.06**	**447650**	**3891.8**	**259486.64**	**2166.45**

(Source of supply ï NSC, SFCI, SSC, M.P. Seed federation, IIFDC, NAFED, KRIBHCO, etc.)

(b)Varietal profile of MP

Crop	Old varieties	Alternative varieties to be promoted/Recommended
Lentil	**K-75** (1986),	**JL-1**(1991), **L-4076**(1993), **JL-3**(2000), **IPL-81**(2001), **RVL-31**(2010), **IPL-316**(2013)
Chickpea **(Medium)**	**JG-315** (1984), **JG-218**(1996), **ICCV 10**(1992), **VIJAY-**(1994)	**JG-322**(1999), **JG-16**(2001), **JG-63**(2006), **JG-226**(2007), **JG-14**(2009),
Chickpea **(Bold)**	**JG-74**(1991), **VISHAL** (1997),	**VIRAT**(2002), **JG-130**(2002), **JAKI-9218**(2007), **RVG-202**(2012)
Chickpea **(Gulabi)**		**GG-1**(1999), **JGG-1**(1999)
Chickpea (**KABULI)**	**ICCV-2**(1993), **ICCV-37** (2001), **JGK-1**(2002),	**KAK-2**(2001), **JGK-2**(2007), **JGK-3**(2007), **IPCK-2002-29**(2009), **IPCK 2004-29**(2010), **JSC-42**(2012), **JSC-40**(2012), **RVG-203**(2013),
Chickpea **(LATE SOWING)**		**JAKI-9218**(2007), **JG-14**(2009), **RVG-202**(2012), **RVG-203**(2013),
wheat	**WH-147** (1978), **Lok-1** (1982) **GW-496** (1990), **GW-173** (1994) **GW-273** (1998), **HI -8498** (1999), **GW -322** (2002)	**GW-366** (2007), **HI 1544** (2007), **MP-1142** (2007), **MP(JW)-3173** (2009) **MP-1215** (2010) **HI 8663** (2008), **MP -1203**(2009), **HD 2932** (2008), **JW 3020** (2005)
Paddy	**Anjali** (2002) **Vandana** (2002)	**JR 201** (2008), **JRH 4 ((h)** 2007), **JRH 5 (h)** (2007), **JRH 8 (h)** (2008), **DRRH 3** (2009

7. Seed Replacement Rate (SRR)

(Figures in Percentage %)

Crops	2008-09	2009-10	2010-11	2011-12	2012-13	2013-14	2014-15
Wheat	13.62	14.25	23.12	24.22	25.30	27.20	-
Paddy	11.05	15.60	12.75	15.94	19.56	22.61	24.39
Maize	19.13	21.23	36.81	47.55	53.08	73.91	74.51
Jowar	13.27	15.85	15.37	22.37	15.39	26.37	21.22
Bajra	50.25	69.35	49.31	69.22	75.07	90.01	87.78
Gram	4.51	5.57	10.39	12.22	12.86	15.78	17.05
Urd	7.42	6.92	9.59	10.61	14.35	15.14	10.62
Moong	21.27	11.44	15.89	21.26	37.89	31.87	22.61
Arhar	7.83	7.58	8.42	15.54	21.98	17.62	18.23
Groundnut	0.57	0.66	0.38	0.93	0.94	0.89	2.81
Mustard/ Rapeseed	21.19	23.81	33.47	48.61	29.18	25.51	
Soybean	19.37	23.78	23.18	31.60	32.15	32.15	22.37
Cotton (Hy/BT)	100.00	100.00	100.00	100.00	100	100	100

8. Soil Testing Labs:-

(a) **Status of Soil Health Card-**

Organization	No. of STL	Capacity/Year	Remarks
State Agriculture Department	24	3,50,000	16, 23794 Soil Health Card distributed since 2009.
State Mandi Board	26		
SAUs	25		
Total	75		

9. (MICRO-NUTRIENT APPLICATION) (Zinc/Sulphur)

(Area-hac., Rs-lakh)

S.No.	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses+ Pulses Addi.	72500	362.50	106320	528.60	127764	638.82	119468	533.65
2	Wheat	110000	550.00	128396	569.20	110000	550.00	91922	401.38
3	Paddy	20000	100.00	22684	85.58	22000	110.00	31989	143.02
	Total	**202500**	**1012.5**	**257400**	**1183.38**	**259764**	**1298.82**	**243379**	**1078.05**

10- Soil Amelioration – gypsum/lime

S. No	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses	25000	187.50	28664	158.83	34000	255.00	30406	173.93
2	Wheat	40000	200.00	21151	80.58	40000	200.00	23682	102.09
	Total	65000	387.5	49815	239.41	74000	455	54088	276.02

11- Farm Implements/ machineries distribution

S.No	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses	11650	1066.50	40493	1228.62	19760	2049.00	45975	1748.84
2	Wheat	14370	1016.25	39387	934.01	13455	975.00	26064	748.48
3	Paddy	4020	198.00	13668	229.59	3596	204.90	10142	177.18
	Total	**30040**	**2280.75**	**93548**	**2392.22**	**36811**	**3228.90**	**82181**	**2674.50**

12- EFFICIENT WATER APPLICATION TOOLS:

12.1 Pump set/ water carrying pipes.

12.1.1 Pump set (Qty in Nos., Rs. In lakh)

S.no	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses	6000	600.00	5877	557.42	2000	200.00	2043	196.6
2	Wheat	7000	700.00	8358	641.61	2150	215.00	2444	240.08
3	Paddy	1700	170.00	1762	176.20	2250	225.00	1726	167.46
	Total	**14700**	**1470**	**15997**	**1375.23**	**6400**	**640**	**6213**	**604.14**

12.1.2 Water carrying pipes. (Unit-Meter, Rs. In Lakh)

S.no	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	**2**	**3**	**4**	**5**	**6**	**3**	**4**	**5**	**6**
1	Pulses	15800	2370.00	16894	2440.03	11523	1728.45	12005	1732.37
	Total	**15800**	**2370**	**16894**	**2440.03**	**11523**	**1728.45**	**12005**	**1732.37**

12.1.3 Distribution of Sprinkler set/ mobile rain gun.

Sprinkler set

S.no	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses	8800	660.00	8550	640.93	11000	825.00	10874	814.68
2	Wheat	12000	900.00	14159	902.86	11334	850.05	10778	757.50
	Total	**20800**	**1560**	**22709**	**1543.79**	**22334**	**1675.05**	**21652**	**1572.18**

Mobile rain gun.

S.no	Crop	2012-13				2013-14			
		Target		Achievement		Target		Achievement	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	Pulses	100	15.00	435	27.51	50	7.50	25	1.99
	Total	**100**	**15**	**435**	**27.51**	**50**	**7.5**	**25**	**1.99**

13. Plant Protection: ENDEMIC AREA

Crops	Districts	Pests	Diseases
Maize & Jowar	Jhabua, Dhar, Betul, Dewas, Indore	Jassid, Thrips, Aphids, Stem, Borer	
Paddy	Balaghat, Satna, Seoni, Mandla	Swarming Caterpillar(eg.- Mythemna Separeta -Army worm), Green-leaf Hopper	Mosaic
Pulses (Gram)	Jabalpur, Hoshanagabad , Narsinghpur, Raisen, Sehore , Vidisha, Bhopal	Gram Cater pillar, Aphid	Mosaic
Cotton	Khandwa, khargone Dhar, Jhabua, Barwani, dewas, Indore	Aphid, Mealy Bug, White fly, Jassid	

13.1 Method of IPM adopted- Mechanical, manual, biological, cultural, chemical and bio- chemical
and approach is both i.e. Individual based/ Community based.

14- Progress of other Initiatives.

(a) Demonstrations by NGO - Nil
(b) Assistance for custom hiring- Nil
(c) Market Support. - Nil
(d) Specialize project- Nil
(e) Value chain integration - Nil

Annex-D

LIST OF LENTIL VARIETIES RECOMMENDED FOR MADHYA PRADESH

S.N.	Variety	Year of release	Source/ origin	Pedigree	Maturity (Days)	100 Seed wt (g)	Yield (q/ha)	Special feature
1	JL 1	1991	JNKVV, Jabalpur	Local sel. From Sehore	120-125	2.5	16-18	Medium large seeds
2	JL 3	1999	JNKVV, Sehore	Selection from local land race of Sagar (M.P.)	115-120	3.0	18-20	Large seed, wilt tolerant
3	Noori (IPL-81)	2000	IIPR, Kanpur	K 75 X PL 639	110-120	2.7	18-20	Large seeds, tolerant to rust & wilt
4	IPL 316	2013	IIPR, Kanpur	Sehore 74-3 X DPL-58	110-115		14-15	Large seed
5	RVL 31	2010	RVSKVV, Sehore	Selection from Vidisha Local	107-110	3.2	14-15	Large seed , Tolerant to Wilt

LIST OF FIELDPEA VARIETIES RECOMMENDED FOR MADHYA PRADESH

S.N.	Variety	Year of release	Source/ origin	Pedigree	Maturity (Days)	Plant type	Yield (q/ha)	Special feature
1	Ambika (IM 9102)	2000	IARI, New Delhi	HFP 4 X Pusa 10	99-115	Dwarf	18-20	Resistant to Powdery Mildew
2	Indra (KMPR 400)	2001	CSAUA & T, Kanpur	Rachna X HFP 4	120-140	Dwarf	20-25	Semi-leafless, resistant to powdery mildew
3	Adarsh (IPF 99-25)	2003	IIPR, Kanpur	PDPD 8 X Pant P 5	110-120	Tall	25-30	Resistant to powdery mildew
4	Vikas (IPFD 99-143)	2005	IIPR, Kanpur	HFP 4 X LFP 80	110-120	Dwarf	25-30	Resistant to powdery mildew
5	Prakash (IPFD 1-10)	2006	IIPR, Kanpur	PDPD 8 X HUYDP 7	110-120	Dwarf	25-30	Resistant to powdery mildew and Rust
6	IPFD 10-12	2014	IIPR, Kanpur	IPF 99-25 X EC 384275	110-115	Dwarf	22-25	Dwarf Type, Resistant to powdery mildew

LIST OF URDBEAN VARIETIES RECOMMENDED FOR MADHYA PRADESH

S.N.	Variety/Hybrid	Pedigree	Place of origin	Year of release	Maturity duration (days)	Special features	Yield (q/ha)
1	Jawahar Urd 2	T 9 X Rewa 1-1	JNKVV, Jabalpur	1987	60-70	Main stem bearing, bkack and large seed, tolerant to MYMV and CLS	13.0
2	Basant Bahar (PDU 1)	Sel. From IC 8219	IIPR, Kanpur	1991	70-80	Erect, dull black large seed, suitable for spring	10-12
3	TPU 4	UM 201 X T 9	BARC, Bombay	1992	70-75	Erect, medium large seed	7-8
4	Barkha (RBU 38)	Selection from local germplasm	RAU, Banswara	1999	75-80	Large seed, tolerant to CLS	9-10
5	Azad Urd 3	PU 19 X NP 21	CSAUAT, Kanpur	2003	75-80	Resistant to MYMV, suitable for Kharif season	8-10
6	Jawahar Urd 3	-	JNKVV, Jabalpur	1987	70-75	For kharif season	13.0
7	AKU 96-3	PU 19 X NP 21	CSAUAT, Kanpur	2003	70-73	For kharif season	10.0
8	NUL 7	NULS11-2 X NULS 86-2-1	Nirmal seeds	2009	70-75	For kharif season	11.0

LIST OF MUNGBEAN VARIETIES RECOMMENDED FOR MADHYA PRADESH

S.N.	Variety	Year of release & notification No.	Source	Pedigree	Yield (q/ha)	Days to maturity	Special feature
1	Pusa 105	1983 295 (E) 09-04-85	IARI New Delhi	(Taiwan-1 X ML6) X (EG-MG 16 X ML 3)	8-10	65-70	Erect, determinate, tolerant to PM & YMV
2	PDM 11	1987 834 (E) 18-09-87	IIPR, Kanpur	Sel. From LM 595	8-10	70-75	Erect bushy, shining green seed, suitable for spring season
3	BM 4	1992 814 (E) 04-11-92	ARS, Badnapur	Mutant of T 44	10-12	65-70	Erect, bushy, green & medium large seed
4	JM 721	1995 1 (E) 01-01-96	JNKVV, Indore	ML 5 X PISM 3	10-12	70-75	Erect, resistant to PM & MYMV
5	HUM 1 (Malviya Jyoti)	1999 425 (E) 08-06-99	BHU, Varanasi	BHUM 1 X Pant U 30	9-11	60-65	Resistant to MYMV, suitable for spring season
6	Pusa 9531	2000 92 (E) 02-02-01	IARI, New Delhi	Sel. From NM 9473	9-10	60-65	Resistant to MYMV, suitable for summer season
7	PKV AKM 4 (AKM 9904)	2009	PDKV, Akola	BM4 X PS 7	10-12	70-75	Early and synchronous maturity, medium large shiny green seed, tol. to PM

मध्यप्रदेश शासन
किसान कल्याण तथा कृषि विकास विभाग
मंत्रालय

क्रमांक बी–8–8/2014/14–2 भोपाल, दिनांक 22 मई, 2014

विषयः–राष्ट्रीय खाद्य सुरक्षा मिशन की राज्य स्तरीय समिति की बैठक का कार्यवाही विवरण।

राज्य स्तरीय राष्ट्रीय खाद्य सुरक्षा मिशन कार्यकारी समिति की बैठक दिनांक 20.05.2014 को मुख्य सचिव की अध्यक्षता में सम्पन्न हुई। बैठक में भाग लेने वाले अधिकारियों की सूची परिशिष्ट एक पर है। इसमें खाद्य सुरक्षा मिशन के क्रियान्वयन से आज दिनांक तक की प्रगति का प्रस्तुतीकरण किया गया।

एजेण्डावार निम्नानुसार निर्देश दिये गये :–
एजेण्डा बिन्दु क्रमांक– (1) वर्ष 2013–14 की 31 मार्च, 2014 की स्थिति में भौतिक एवं वित्तीय प्रगति :–

(1) बैठक नियमित रूप से आयोजनः– इस बाबत् बैठक में निर्देश दिये गये कि समिति की बैठक नियमित रूप से हो व अनिवार्यतः प्रति रबी एवं खरीफ सत्र से पर्याप्त समय पूर्व इसका आयोजन किया जावे ताकि समीक्षा करते हुऐ भावी कार्यक्रम के निर्देश दिये जा सके। समिति की गत बैठक कब–कब हुई है, इसकी जानकारी दी जावे।

(2) खाद्य सुरक्षा मिशन की आधारभूत जानकारी बाबत् विभाग में विवरण उपलब्ध रहें कि :–

अ– इस योजना का प्रारंभ करते समय धान, गेहूँ, दलहन के उत्पादन, उत्पादकता का स्तर क्या था।
ब– वर्षवार इसमें क्या वृद्धि प्राप्त हुई।
स– इसके तहत क्या वृद्धि की जानी थी।
द– आधार वर्ष से एक चार्ट के रूप में बतावें कि क्षेत्रफल व उत्पादन में क्या–क्या वृद्धि हुई है।

(3) जिलों के चयन का आधारः– गेहूँ, धान, दलहन में जिन जिलों का चयन किया गया है उनका आधार क्या है, क्या विभाग इस चयनित जिलों में कोई परिवर्तन प्रस्तुत करना चाहेगें। इसका समस्त विवरण एक चार्ट के रूप में क्षेत्रफल, उत्पादन, उत्पादकता को दर्शाते हुए बनाया जावे।

(4) योजनाओं के अंतर्गत आदान का वितरणः– योजना में जो उपकरण वितरित किये जा रहे है व कितने प्रभावी है। इस बाबत् भी विभाग निरन्तर ध्यान रखें।

(5) दलहन में क्षेत्रफल विस्तारः– दलहन में यह कार्यक्रम लागू होने के पश्चात् जिलेवार विस्तार क्या रहा है एक चार्ट के रूप में समग्र स्थिति बतायी जावे। वर्ष 2014–15 के कार्यक्रम के अनुमोदन पश्चात् हमारा उत्पादन कितना बढ़ेगा व वर्तमान स्तर से हम किस स्तर पर ले जावेगें।

(6) देश के अन्य राज्यों की स्थिति में राज्य की स्थिति क्या है।

(7) कार्यक्रम के अंतर्गत् बीज, तकनीकी उपयोग (जैसे–एस0आर0आई पद्धति विस्तार) आदि हेतु रणनीति क्या है।

(8) पंप सेट वितरणः– गत वर्ष पंप सेट वितरण में डीजल/इलेक्ट्रिक पंप कितने वितरित किये गये। इसका ब्रेकअप दर्शाया जावे।

एजेण्डा बिन्दु क्रमांक– (2) वर्ष 2014–15 की प्रस्तावित कार्ययोजना जो भारत सरकार को प्रेषित की गई है का अनुमोदनः–कार्ययोजना का अनुमोदन किया गया। इसे भारत सरकार को भेजा जावे।

एजेण्डा बिन्दु क्रमांक– (3) राष्ट्रीय खाद्य सुरक्षा मिशन अंतर्गत पदस्थ परियोजना प्रबंधन दलों के युक्तिकरण हेतु अनुमोदनः– सैद्धान्तिक रूप में प्रस्ताव का अनुमोदन किया जाता है। विभाग कृषि उत्पादन आयुक्त को इसका विस्तृत विवरण प्रस्तुत करेगें कि जिलेवार इस प्रकार क्या युक्तिकरण किया जाना है व उनका अनुमोदन प्राप्त कर इसे जारी किया जावे।

एजेण्डा बिन्दु क्रमांक– (4) राष्ट्रीय खाद्य सुरक्षा मिशन अंतर्गत पदस्थ परियोजना प्रबंधन दलों के मानदेय वृद्धि हेतु अनुमोदनः– मिशन के अंतर्गत पदस्थ परियोजना प्रबंधन दलों के मानदेय में वृद्धि का अनुमोदन इस शर्त के साथ किया गया कि इस वृद्धि की समस्त राशि भारत सरकार से व प्रबंधन दल का सेटअप भारत सरकार के दिशा निर्देशों के अनुरूप होगा।

अंत में अध्यक्ष महोदय को धन्यवाद ज्ञापित कर बैठक समाप्त हुई।

-sd-
(बी0एस0 धुर्वे)
उप सचिव
मध्य प्रदेश शासन
एवं उप कृषि उत्पादन आयुक्त

क्रमांक बी–8–8/2014/14–2 भोपाल, दिनांक 22 मई, 2014

प्रतिलिपि–

1. अपर मुख्य सचिव एवं कृषि उत्पादन आयुक्त, मध्य प्रदेश शासन, मंत्रालय, भोपाल।
2. अपर मुख्य सचिव मध्य प्रदेश शासन, पंचायत एवं ग्रामीण विकास विभाग मंत्रालय, भोपाल।
3. प्रमुख सचिव/सचिव, मध्य प्रदेश शासन, ऊर्जा/जल संसाधन/आदिम जाति कल्याण/किसान कल्याण एवं कृषि विकास विभाग, मंत्रालय, भोपाल।
4. महाप्रबंधक, राष्ट्रीय कृषि ग्रामीण विकास बैंक, (नाबार्ड) भोपाल।
5. संचालक, किसान कल्याण एवं कृषि विकास विभाग की ओर प्रेषित कर लेख है कि उपरोक्तानुसार एजेण्डा बिन्दु क्रमांक 01 में उल्लेखित आठ बिन्दुओं की जानकारी तत्काल उपलब्ध कराऐं जिससे मुख्य सचिव महोदय को अवलोकन कराया जा सके।
6. मिशन संचालक, एन0एफ0एस0एम0 की ओर आवश्यक कार्यवाही हेतु।
7. महाप्रबंधक, सेन्ट्रल बैंक अरेरा हिल्स मुख्यालय, भोपाल।
8. अपर सचिव, मुख्य सचिव कार्यालय मंत्रालय, भोपाल।
9. कुलपति, जवाहर लाल नेहरू कृषि विश्वविद्यालय, जबलपुर।
10. कुलपति, राजमाता विजयाराजे सिंधिया कृषि विश्वविद्यालय, ग्वालियर।

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(बी0एस0 धुर्वे)
उप सचिव
मध्य प्रदेश शासन
एवं उप कृषि उत्पादन आयुक्त

विषयः राष्ट्रीय खाद्य सुरक्षा मिशन की राज्य स्तरीय समिति की दिनांक 20.05.2014 को आयोजित बैठक का पालन प्रतिवेदन।

राज्य स्तरीय खाद्य सुरक्षा मिशन कार्यकारी समिति की बैठक दिनांक 20.05.2014 को मुख्य सचिव की अध्यक्षता में संपन्न हुई जिसकी कार्यवाही विवरण का पालन प्रतिवेदन निम्नानुसार है :–

एजेण्डा बिन्दु क्रमांक– 1

1. बैठक नियमित रूप से आयोजन :–राज्य स्तरीय खाद्य सुरक्षा मिशन कार्यकारी समिति की बैठक वर्ष 2009–10 में दिनांक 07.12.2009 को, वर्ष 2011–12 में दिनांक 01.11.2011 को एवं वर्ष 2012–13 में दिनांक 03.07.2012 को आयोजित की गई है। संबंधित अभिलेख परिशिष्ट–1 पर है।

1. खाद्य सुरक्षा मिशन की आधारभूत जानकारी :–

(अ) राष्ट्रीय खाद्य सुरक्षा मिशन योजना का प्रारम्भ मध्य प्रदेश में वर्ष 2007–08 से किया गया है, प्रारम्भ वर्ष में दलहन का कुल उत्पादन 2675 हजार टन एवं उत्पादकता 608 किलोग्राम/हेक्टेयर थी। वर्ष 2012–13 में 21.1 प्रतिशत की बढ़ती दर से कुल उत्पादन 5041 हजार टन एवं 18.0 प्रतिशत की बढ़ती दर से उत्पादकता 947 किलोग्राम/हेक्टेयर प्राप्त हुई। वर्ष 2012–13 गेहूँ अंतर्गत 35.8 प्रतिशत की दर से वृद्धि कर कुल उत्पादन 17250.9 हजार टन एवं 22.8 प्रतिशत दर से उत्पादकता 3184 किलोग्राम/हेक्टेयर प्राप्त हुई।

राष्ट्रीय खाद्य सुरक्षा मिशन योजना के अंतर्गत वर्ष 2007–08 फसल धान को शामिल किया गया । आधार वर्ष में उत्पादन 1578 हजार टन एवं उत्पादकता 919 किलोग्राम/हेक्टेयर थी। मिशन लागू होने पर वर्ष 2012–13 में 85.0 प्रतिशत की दर से वृद्धि कर कुल उत्पादन 4120.29 हजार टन एवं 75.9 प्रतिशत दर से उत्पादकता 2357 किलोग्राम/हेक्टेयर प्राप्त हुई। विस्तृत विवरण परिशिष्ट–2

(ब) प्रदेश में राष्ट्रीय खाद्य सुरक्षा मिशन योजना प्रारंभ वर्ष में दलहन, गेहूँ एवं धान अंतर्गत निम्नानुसार वृद्धि प्राप्त की गई

क्रं.	फसल	प्रारंभ वर्ष (2007–08)		प्रारंभ वर्ष (2012–13)		प्राप्त वृद्धि	
		उत्पादन	उत्पादकता	उत्पादन	उत्पादकता	उत्पादन	उत्पादकता
1	दलहन	2674.7	608	5041.0	947	2366.3	339
2	गेहूँ	6729.3	1646	17250.9	3184	10521.6	1538
3	धान	1578	919	4120.2	2357	2542.2	1437

वर्षवार प्राप्त वृद्धि का विस्तृत संलग्न परिशिष्ट–3

(स) बिन्दु क्रमांक ''स'' की जानकारी संकलित की जा रही है।

(द) राष्ट्रीय खाद्य सुरक्षा मिशन योजनान्तर्गत आधार वर्ष से दलहन अन्तंर्गत क्षेत्रफल 4400.6 हजार हैक्टेयर एवं उत्पादन 2674.7 हजार टन था जो की बढ़त प्राप्त कर वर्ष 2012–13 में क्षेत्रफल 5324.4 हजार हैक्टेयर एवं उत्पादन 5041.0 हजार टन हो गया है।

प्रदेश में गेहूँ अंतर्गत वर्ष 2007–08 में 4089.3 हजार हैक्टेयर एवं 6729.3 हजार टन था जो कि वर्ष 2012–13 में क्षेत्रफल 5418.8 हजार हैक्टेयर एवं उत्पादन 17250.9 हजार टन प्राप्त किया गया।

प्रदेश में धान योजना प्रारंभ वर्ष में क्षेत्रफल 1716.8 हजार हैक्टेयर लेकर 1578.0 हजार टन उत्पादन था। वर्ष 2012–13 में क्षेत्रफल एवं उत्पादन क्रमशः 1748.3 हजार हैक्टेयर एवं 4120.2 हजार टन वृद्धि हुई है। चार्ट संलग्न परिशिष्ट–4

1. जिलों के चयन का आधारः– राष्ट्रीय खाद्य सुरक्षा मिशन अन्तंर्गत जिलों का चयन भारत सरकार के द्वारा किया जाता है। भारत सरकार के द्वारा क्षेत्रफल एवं उत्पादकता को चयन का आधार रखा जाता है।

2. राष्ट्रीय खाद्य सुरक्षा मिशन योजनांन्तर्गत वितरित उपकरण जैसे रोटावेटर, सीड ड्रिल, डीजल/विद्युत पम्प, पाईप लाईनों आदि की ओर कृषकों का अत्याधिक रूझान शुरू से ही रहा है। डीजल/विद्युत पम्प, पाईप लाईन कृषकों के बीच अधिक लोकप्रिय है। राष्ट्रीय खाद्य सुरक्षा मिशन योजनान्तर्गत वितरित उपकरणों का पुनिर्वेशन अच्छा प्राप्त होता है।

3. दलहन में क्षेत्रफल विस्तारः– दलहन में कार्यक्रम लागू होने के पश्चात् जिलेवार विस्तार की जानकारी परिशिष्ट–5 पर है।

4. देश के अन्य राज्यों की स्थिति में राज्य दलहन में प्रथम स्थान, गेहूँ में तृतीय स्थान एवं धान में चौदवां स्थान रखता है। परिशिष्ट–6

5. कार्यक्रम के अन्तर्गत बीज एवं तकनीकी हेतु रणनीतिः– राष्ट्रीय खाद्य सुरक्षा मिशन मे ंएस0आर0आइ0 पद्धति अन्तर्गत राज्य स्तर से 30 प्रतिशत क्षेत्राच्छादन का लक्ष्य रखा गया है। बीज वितरण अनुदान अन्तंर्गत 10 वर्ष से कम की प्रजातियों का वितरण किया जावेगा।

6. पंप सेट वितरणः– पंप सेट वितरण की जानकारी प्राप्त करने हेतु पत्र कमांक /NFSM/बैठक/2014–15/2417, दिनांक 24.05.2014 को पत्र लेख किया गया था। 22 जिलों से प्राप्त जानकारी अनुसार डीजल पंप 1926 एवं विद्युत पंप 3693 वितरित किये गये है। जिलों के पुनः स्मरण पत्र भेजा गया है। विस्तुत विवरण परिशिष्ट–7

एजेण्डा बिन्दु क्रमांक– 2

वर्ष 2014–15 में भारत सरकार को राज्य द्वारा प्रेषित प्रस्तावित कार्ययोजना एवं स्वीकृत कार्यक्रम की जानकारी इस प्रकार हैः

(राशि रूपये लाख में)

क्रं	फसल	प्रस्तावित कार्यक्रम	भारत सरकार से स्वीकृत कार्यक्रम
1	दलहन	21441.38	17824.36
2	धान	2204.56	1926.18
3	गेहूँ	8210.10	6924.45
4	मोटा अनाज	1630.50	1536.00
योग		33486.50	28210.99

वर्ष 2014–15 में राष्ट्रीय खाद्य सुरक्षा मिशन अन्तंर्गत् दलहन, धान, गेहूँ एवं मोटा अनाज का भारत सरकार द्वारा स्वीकृत कार्यक्रम परिशिष्ट–8 पर है।

एजेण्डा बिन्दु क्रमांक– 3

राष्ट्रीय खाद्य सुरक्षा मिशन अन्तंर्गत पदस्थ परियोजना प्रबंधन दलों के युक्तीकरण की नस्ती तैयार की जा रही है।

एजेण्डा बिन्दु क्रमांक– 4

राष्ट्रीय खाद्य सुरक्षा मिशन अन्तर्गत पदस्थ परियोजना दलों के मानदेय वृद्धि हेतु नस्ती प्रचलन में है।

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संयुक्त संचालक (**NFSM**)
सिऐट भोपाल म.प्र.

Annexure-II

Physical and Financial Progress during 2013-14

1. NFSM-Rice

Rs. In lakh

S. No.	Intervention	Approved Rate	Unit	Target Approved GOI		Achivement		Achivement %	
				Physical	**Financial**	**Physical**	**Financial**	**Physical**	**Financial**
1	Cluster Demonstrations by state Department of Agriculture with the technical backstopping of ICAR /IRRI (One Cluster or 100 ha)								
	(a) Direct Seeded Rice/Line Transplanting/ SRI (Target 1.5% of area of District)	Rs 7500/- per ha.	Ha.	3120	234.00	3120	190.58	100	81.44
	(b) Cluster Demonstrations on Hybrid Rice (One Cluster or 100 ha) Target 0.5% of area of District	Rs 7500/- per ha.	Ha.	2000	150.00	2000	127.20	100	84.80
	Sub Total 1 (a)+(b)			**5120**	**384.00**	**5120**	**317.78**		
2	**Seed Distribution :**								
	(a) Hybrid Rice Seed	Rs 2000/- per Qtl	Qtl	2000	40.00	71	1.42	4	3.55
	(b) HYVs Seeds	Rs 500/- per Qtl	Qtl	20000	100.00	2877	10.13	14	10.13
	Sub Total			**22000**	**140.00**	**2948**	**11.55**		
3	**Plant and Soil Protection Management :**								
	(a) Micronutrients	Rs 500/- per Ha.	Ha.	22000	110.00	31989	143.02	145	130.02
	(c) Plant Protection Chemicals & bio-agents	Rs 500/- per Ha.	Ha.	18044	90.22	24869	121.08	138	134.21
	Sub Total 3 (a) to 3(c)			**40044**	**200.22**	**56858**	**264.10**		
4	**Resource Conservation Techniques/ Tools :**								
	(a) Conoweeder	Rs 3000/- per Machine	Nos.	800	24.00	952	15.28	119	63.67
	(b) Knap Sack Sprayers	Rs 3000/- per Machine	Nos.	2100	63.00	8597	60.52	409	96.06

	(c) Zero till seed drill	Rs 15000/- per Machine	Nos.	50	7.50	5	0.75	10	10.00
	(e) Seed Drills	Rs 15000/- per Machine	Nos.	550	82.50	505	75.73	92	91.79
	(f) Power Weeders	Rs 15000/- per Machine	Nos.	6	0.90	0	0.00	0	0.00
	(i) Rotavators	Rs 30000/- per Machine	Nos.	90	27.00	83	24.90	92	92.22
	Sub Total 4(a) to 4(j)			**3596**	**204.90**	**10142**	**177.18**		
5	**Incentive for Pump Sets**	Rs.10000/- per Pumpset	Nos.	2250	225.00	1726	167.46	77	74.43
6	**Cropping System based trainings** (Four Sessions i.e. One before Kharif, one each during Kharif & Rabi crops and one after rabi harvest)	Rs.3500/-Sessions Rs.14000/-Training	Nos.	150	21.00	150	21.00	100	100.00
7	**Miscellaneous expenses**								
	(a) Project management team & other Miscellaneous Expenses District level.	Rs. 6.36 lakh per disstt.	No. of District	9	57.24	9	59.59	100	104.11
	(b) Project management team & other Miscellaneous Expenses State level.	Rs.13.87 lakh per State	No. of District	1	13.87	1	4.97	100	35.82
8	**Local Initiatives :** (Focus should be water harvesting structures for promotion of SRI and providing irrigation)								
	Pipe for carrying water from Source to the Field	Rs.15000/-per Farmer	Nos.	1200	180.00	1234	161.87	103	89.93
	Sub Total			&	&				
	Total Financial (1 to 8)				**1426.23**		**1185.50**		

2. NFSM-Wheat

S. No.	Intervention	Approved Rate	Unit	Target Approved GOI		Achivement		Achivement %	
				Physical	Financial	Physical	Financial	Physical	Financial
	1	2	3	4	5	6	8	9	10
	Cluster Demonstrations by state Department of Agriculture with the technical backstopping of ICAR /IRRI (One Cluster or 100 ha)	Rs 12500/- per ha.		15000	1875.00	15250	1355.76	102	72.31
2	**Distribution of certified Seeds of improved varieties**	Rs 500/- per Qtl.	Ha.	240000	1200.00	117873.8	454.68	49	37.89
3	**Need based Plant/ Soil management**								
	(a) Micronutrients	Rs 500/- per Ha.	Ha.	110000	550.00	91922	401.38	84	72.98
	(b) Gypsum	Rs 500/- per Ha.	Ha.	40000	200.00	23682	102.10	59	51.05
	(c) Plant protection chemicals and Bio-agents	Rs 500/- per Ha.	Ha.	57930	289.65	45726	209.57	79	72.35
	Sub Total 3(a) to 3(c)			**207930**	**1039.65**	**161330**	**713.05**		
4	**Resource Conservation Technologies/ Tools :**					&	&		
	(a) Knap Sack Sprayers	Rs 3000/- per Machine	Nos.	10000	300.00	23126	165.76	231	55.25
	(b) Zero Till Seed Drills	Rs 15000/- per Machine	Nos.	20	3.00	2	0.30	10	10.00
	(c) Multi-crop planters	Rs 15000/- per Machine	Nos.	20	3.00	&	&		
	(d) Seed Drills	Rs 15000/- per Machine	Nos.	2400	360.00	1927	282.72	80	78.53
	(e) Zero Till Crop Planter	Rs 15000/- per Machine	Nos.	5	0.75	&	&		

	(f) Ridge Furrow Planters	Rs 15000/- per Machine	Nos.	5	0.75	&	&		
	(g) Rotavators	Rs 30000/- per Machine	Nos.	1000	300.00	1008	298.20	101	99.40
	(h) Leaser Land lever	Rs 150000/- per Machine	Nos.	5	7.50	1.00	1.50	20	20.00
	Sub Total 4(a) to 4(h)			**13455**	**975.00**	**26064.00**	**748.48**		
5	**Efficient Water Application Tools :**								
	(a) Incentive for pump sets	Rs.10000/-per machine.	No.	2150	215.00	2444	240.08	114	111.66
	(b) Distribution of Sprinkler sets	Rs.7500/- per ha.	Ha.	11334	850.05	10778	757.50	95	89.11
	Sub Total 5(a) to 5(b)			**13484**	**1065.05**	**13222**	**997.5719**		
6	**Cropping System based trainings**	Rs.3500/- Sessions Rs.14000/- Training	Nos.	900	126.00	847	105.69	94	83.88
7	**Miscellaneous expenses**								
	(a) Project management team & other Miscellaneous Expenses District level.	Rs. 6.38 lakh per distt.	No. of District	30	191.40	30	158.82	100	82.98
	(b)Project management team & other Miscellaneous Expenses State level.	Rs. 13.87 lakh per distt.	No. of State	1	13.87	1	1.71	100	
8	**Local Initiatives :**								
	Activity not specified	Rs.15000/-per Farmer	Nos.of Farmer		120.00	&	&		
	Sub Total of Local Initiatives :					&	&		
	Total Finacial (1 to 8)				**6605.97**		**4535.76**		

3. NFSM-Pulses

S. N	Intervention	Approved Rate	Unit	Target Approved GOI		Achivement		Achivement %	
1	**Distribution of certified Seeds**			**Physical**	**Financial**	**Physical**	**Financial**	**Physical**	**Financial**
	(a) For varieties less than 10 years	Rs 2200/- per Qtl	Qtl	22000	484.00	16943	342.01	77.01	70.66
	(b) For varieties more than 10 years old	Rs 1200/- per Qtl	Qtl	118250	1419.00	78964	827.08	66.78	58.29
	SubTotal 1(a)+(b)			**140250**	**1903.00**	**95906**	**1169.09**		
2	**Demonstrations of improved Technologies :**								
	(a) Cluster Demonstrations (of 100 ha each) on inter-cropping /improved varieties/ farm implements like Ridge Furrow makers/seed drills.	Rs 5000/- per Ha.	Ha.	73200	3660.00	74617	3275.50	101.94	89.49
3	**Integrate Nutrient Management**								
	(a) Micronutrients	Rs 500/- per Ha.	Ha.	100000	500.00	95310	422.97	95.31	84.59
	(b) Lime/Gypsum/80% WG Sulphur	Rs 750/- per Ha.	Ha.	30000	225.00	26255	147.86	87.52	65.72
	(c) Rhizobium culture / Phosphate solubilizing bacteria distribution/ Microrizha	Rs.100/- per ha.	Ha.	100000	100.00	71624	55.26	71.62	55.26
	Sub Total			**230000**	**825.00**	**193189**	**626.09**		
4	**Integrated Pest Management (IPM)**								
	(a) IPM Package	Rs 750/- per Ha.	Ha.	80000	600.00	72254	524.98	90.32	87.50
	(b) Distribution of NPV	Rs 250/- per Ha.	Ha.	20000	50.00	7373	15.31	36.87	30.62
	(c) Distribution of P.P. Chemicals	Rs 500/- per Ha.	Ha.	80000	400.00	87757	396.04	109.70	99.01
	(d) Weedicides	Rs 500/- per Ha.	Ha.	15064	75.32	10115	44.79	67.15	59.47
	Sub Total			**195064**	**1125.32**			0.00	0.00
5	**Resource Conservation Technologies/ Tools :**								
	(a) Knap Sack Sprayers	Rs 3000/- per Machine	Nos.	12000	360.00	39551	310.88	329.59	86.36
	(b) Zero Till Seed Drills	Rs 15000/- per Machine	Nos.	40	6.00	2	0.30	5.00	5.00
	(c) Multi crop Planter	Rs 15000/- per Machine	Nos.	20	3.00			0.00	0.00

	(d) Seed Drills	Rs 15000/- per Machine	Nos.	3160	474.00	2166	313.91	68.54	66.23
	(e) Zero till crop planter	Rs 15000/- per Machine	Nos.	20	3.00			0.00	0.00
	(f) Ridge Furrow planter	Rs 15000/- per Machine	Nos.	20	3.00			0.00	0.00
	(g) Rotavators	Rs 30000/- per Machine	Nos.	2500	750.00	2231	670.30	89.24	89.37
	(h) Laser Land Levelers	150000- per Machine	Nos.	0	0.00				
	Sub Total			**17760**	**1599.00**	**43950**	**1295.39**		
6	**Efficient Water Application Tools :**								
	(a) Distribution of Sprinkler sets	Rs.7500/- per ha.	Ha.	11000	825.00	10874	814.68	98.85	98.75
	(b) Incentive for Mobile Sprinkler Rainguns	Rs.15000/- per ha.	Nos.	50	7.50	25	1.99	50.00	26.53
	(c) Incentive for pump sets	Rs.10000/-per machine.	Nos.	2000	200.00	2043	196.60	102.15	98.30
	(d) Pipe for carrying water from source to the field	Rs.15000/-per Farmer	Nos.	11523	1728.45	12005	1732.37	104.18	100.23
7	Cropping System based trainings (Four Sessions i.e. One before Kharif, one each during Kharif & Rabi crops and one rabi harvest)	Rs.3500/-Sessions Rs.14000/-Training	Nos.	1750	245.00	1463	201.19	83.60	82.12
8	**Miscellaneous expenses**								
	(a) Project management team & other Miscellaneous Expenses District level.	Rs. 4.47 lakh per dist.	No. of District	20	89.40	20	80.36	100.00	89.89
	(b) Project management team & other Miscellaneous Expenses State level.	Rs. 6.28 lakh per State	No. of District	1	6.28	1	4.95	100.00	78.76
	(c) Misc.Expenses to State for other Districts	Rs. 1.00 lakh per dist.	No. of District	30	30.00	30	30.48	100.00	101.60
9	**Local Initiatives :**								
	(d) Pipe for carrying water from source to the field	Rs.15000/-per Farmer	Nos.						
	Sub Total								
	Total Financial (1 to 9)				**12243.95**		**10409.81**		

4. NFSM –Pulses (Additional Programme)

S. No.	Intervation	Approved Rate	Unit	Target		Achivement		Achivement%	
				Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	2	3	4	5	6	7	8	9	10
1	**Demonstration of Seed**								
	(a) For varieties less than 10 years	Rs 2200/- per Qtl	Qtl	10000	220.00	9072.4	191.55	90.72	87.07
	(b) For varieties more than 10 years old	Rs 1200/- per Qtl	Qtl	35400	424.80	33686	339.58	95.16	79.94
2	**Demonstrations of improved Technologies :**								
	(a) Cluster Demonstrations (of 100 ha each) on inter-cropping /improved varieties/ farm implements like Ridge Furrow makers/seed drills.	Rs 5000/- per Ha.	Ha.	62550	3127.50	74087	3407.49	118.44	108.95
3	**Integrate Nutrient Management**								
	(a) Micronutrients	Rs 500/- per Ha.	Ha.	27764	138.82	24158	110.68	87.01	79.73
	(b) Lime/Gypsum/80% WG Sulphur	Rs 750/- per Ha.	Ha.	4000	30.00	4151	26.07	103.78	86.89
	Sub Total								
4	**Integrated Pest Management (IPM)**								
	(a) IPM Package	Rs 750/- per Ha.	Ha.	30000	225.00	27416	196.44	91.39	87.31
	(c) Distribution of P.P. Chemicals	Rs 500/- per Ha.	Ha.	80000	400.00	67581	310.31	84.48	77.58
	Sub Total								
5	**Resource Conservation Technologies/ Tools :**								
	(d) Seed Drills	Rs 15000/- per Machine	Nos.	1000	150.00	946	138.15	94.60	92.10
	(g) Rotavators	Rs 30000/- per Machine	Nos.	1000	300.00	1079	315.30	107.90	105.10
6	**Efficient Water Application Tools :**								
	(a) Distribution of Sprinkler sets	Rs.7500/- per ha.	Ha.	49300	3697.50	46670	3406.68	94.67	92.13
	(d) Pipe for carrying water from source to the field	Rs.15000/-per Farmer	Nos.	8150	1222.50	7825	1160.09	96.01	94.89
	Total Financial (1 to 6)				**9936.12**		**9602.33**		
7	A3P		Ha.	56030	3036.88	37690	1496.15		
	Total				**12973.00**		**11098.48**		

5. A3P

S.N.	Interventions	Target		Achivement		Achivement%	
		Phy.	Fin.	Phy.	Fin.	Phy.	Fin.
1	2	3	4	5	6	7	8
A	**Kharif**						
1	Black gram (Urd)	260	1248.00	281.30	1175.85	108.19	94.22
2	Pigeonpea	40	216.00	40	196.30	100	90.88
Total		**300**	**1464.00**	**321.3**	**1372.15**		
B	**Rabi**						
1	Chikpea	669	3746.40	698.97	3471.51	104.48	92.66
2	Lentil	150	750.00	151.20	664.63	100.8	88.62
3	Rabi/Summer moong			13	46.47		
Total		**819**	**4496.40**	**863.17**	**4182.61**		
Grand Total		**1119**	**5960.40**	**1184.47**	**5554.76**		

Annexure-III

Physical and Financial Progress during 2014-15

1. NFSM-Rice

Rs. In Lakh

S.No.	Intervation	Approved rate of Assistance	Unit	Targets Total		Achievment Total	
				Phy	Fin.	Phy	Fin.
1	2	3	4	10	11	12	13
1	*Cluster Demonstrations by State Department of Agriculture with the technical backstopping of ICAR/SAUs/IRRI (One Cluster of 100 ha) (a) Direct Seeded Rice/ Line Transplanting/SRI (Target 1.5% of area of District)						
	a) Direct seeded rice	Rs.7500/ha.	ha	1500	112.50	1154	13.89
	b) Line transplanting		ha	1128	84.60	1103	17.05
	c) SRI			1500	112.50	1500	19.74
	Sub total		ha	**4128**	**309.60**	3757	0.00
	(a) Demonstrations on Hybrid Rice (One cluster of 100 ha) Target 0.5% of Area of District	Rs.7500/ha	ha	4000	300.00	4000	57.88
	Sub Total				**609.60**	0	0.00
2	**Seed Distribution:**					0	0.00
	(a) Hybrid Rice Seed	Rs.5000/qtl	Qtl	5900	295.00	0	0.00
	(b) HYVs Seeds	Rs.1000/qtl	Qtl	31000	310.00	500	3.39
	2 (a+b) sub total			**36900**	**605.00**	0	0.00
3	Plant and Soil Protection Management:					0	0.00
	(a) Micronutrients	Rs.500/ha	ha	15000	75.00	600	0.00
	(b) Plant Protection Chemicals and bio-agents	Rs.500/ha	ha	15000	75.00	500	0.00
	(d)Weedicides	Rs.500/ha	ha	15000	75.00	370	0.00
	Sub-Total 3 (a) to 3 (e)				**225.00**	0	0.00
4	Resource Conservation Techniques/Tools:					0	0.00
	(a) Cono-weeder	Rs.600/Unit	Nos.	2500	15.00	0	0.00

	(b) Manual Sprayer	Rs. 600/Unit	Nos.	2500	15.00	295	0.33
	(c) Power knack Sack sprayer	Rs3000/Unit	Nos.	50	1.50	5	0.00
	(d) Multi Crop Planter	Rs.15000/Unit	Nos.	3	0.45	0	0.00
	(e) Seed drill	Rs.15000/Unit	Nos.	250	37.50	32	0.75
	(f) Power Weeder	Rs.15000/Unit	Nos.	10	1.50	0	0.00
	(g) Zero Till Multi Crop Planter	Rs.15000/Unit	Nos.	2	0.30	0	0.00
	(h) Drum seeder	Rs.1500/Unit	Nos.	5	0.08	0	0.00
	(i) Rotavator	Rs.35000/Unit	Nos.	200	70.00	7	1.35
	Sub-Total 4(a) to 4 (l)			**5520**	**141.33**	0	0.00
5	Incentive for Pump Sets	Rs.10000/Unit	Nos.	2500	250.00	118	8.78
6	Paddy thresher/multi-crop thresher	Rs.40000/Unit	Nos.	5	2.00	0	0.00
7	Self Propelled Paddy transplanter	Rs.75000/Unit	Nos.	5	3.75	0	0.00
8	Cropping System based trainings (Four Sessions i.e. one before Kharif and rabi seasons, One each during Kharif and Rabi crops)	Rs.3500/ Session Rs.14000/ Training	Nos.	75	10.50	63	7.04
9	**Local Initiatives**			0	0.00	0	0.00
	Winover (hand opereted machine)	2500/-		3160	79.00	0	0.00
	Grand Total(1 to 11)				**1926.18**		**130.20**

2. NFSM-Pulses

S.No.	Interventions	Approved Rate of Assistance	Unit	Target		Achivment	
				Phy.	Fin.	Phy.	Fin.
1	***Demonstrations on Improved Technologies:**						
	(a) Cluster Demonstrations (of 100 ha each) Moong,Urd. Pigeonpea	Rs.7500/ha	ha	82786	6208.95	12741	258.93428
2	**Distribution of Certified Seeds:**			0	0		
	HYVs seeds	Rs.2500/qtl	Qtl	215000	5375	1965.08	43.85
3	**Integrate Nutrient Management:**			0	0		
	(a) Micro-nutrients	Rs.500/ha	ha	200000	1000	5379	7.79441
	(b) Gypsum/80% WG Sulphur	Rs.750/ha	ha	60000	450	925	0
	(d) Bio-fertilizers	Rs.100/ha	ha	130000	130	4655	1.303
4	**Integrated Pest Management (IPM)**			0	0		
	(a) Distribution of PP Chemicals	Rs.500/ha	ha	70000	350	3123	4.54445
	(b) Weedicides	Rs.500/ha	ha	22000	110	1445	1.46595
5	**Resource Conservation Technologies/Tools:**			0	0		
	(a) Manual Sprayer	Rs. 600/Unit	Nos.	15000	90	1319	2.226
	(b) Power Knap Sack Sprayer	Rs.3000/Unit	Nos.	400	12	49	0.647
	(c) Zero Till Seed Drill	Rs.15000/Unit	Nos.	25	3.75	7	0
	(d) Multi Crop Planter	Rs.15000/Unit	Nos.	25	3.75	0	0
	(e) Seed Drill	Rs.15000/Unit	Nos.	1000	150	96	5.25
	(f) Zero Till Multi Crop Planter	Rs.15000/Unit	Nos.	10	1.5	0	0
	(g) Ridge Furrow Planter	Rs.15000/Unit	Nos.	25	3.75	0	0
	(h) Chiseller	Rs.8000/Unit	Nos.	10	0.8	0	0
	(i) Rotavator	Rs.35000/Unit	Nos.	1500	525	128	16.35
	(j) Laser Land Leveler	Rs.150000/Unit	Nos.	10	15	0	0
	(k) Tractor mounted sprayer	Rs. 10000/Unit	Nos.	25	2.5	0	0
	(l) Multi crop thresher	Rs. 40000/Unit	Nos.	800	320	66	6.8

6	**Efficient Water Application Tools:**			0	0		
	(a) Sprinkler Sets	Rs.10000/ha	ha	6000	600	445	0.28313
	(b) Pump Sets	Rs.10000/Unit	Nos.	4161	416.1	272	8
	(c) Pipe for carrying water from source to the field	Rs. 15000 or Rs.25/m upto 600m	No.	8924	1338.6	471	25.3488
	(d) Mobile Rain gun	Rs. 15000/Unit	Nos.	66	9.9	0	0
7	**Cropping System based trainings** (Four Sessions i.e. One before Kharif and rabi seasons, one each during Kharif and Rabi Crops)	Rs.3500/ Session Rs.14000/ Training	Nos.	434	60.76		14.9625
8	**Miscellaneous Expenses** Project Management Team & Other Miscellaneous Expenses at District level	Rs. 14.00 lakh unit of state PMT		50	300	135	128.88536
	Total				**17477.36**		**526.64488**

3. NFSM- Coarse Cereals

SI.No	Interventions	Apporved Rate of Assistance	Unit	Target		Achivement	
				Phy.	Fin.	Phy.	Fin.
1	**Demonstration of Improved package**						
	(a) Maize	Rs. 5000/ha	Ha.	**22320**	**1116**	**18160**	**205.7368**
	(b) Pear Millet	Rs. 5000/ha	Ha.	**1000**	**50**	**964**	**2.8**
	(c) Small Millet (Kodo Kutki)	Rs. 5000/ha	Ha.	**1000**	**50**	**860**	**1.1**
	Sub-total 1(a)'1(b) and 1©			**24320**	**1216**	**19984**	**209.6368**
2	**Distribution of Certified Seed**						
	(a) HVY seeds	Rs. 1500	Qtl	**6500**	**97.5**	**39.2**	**1.96**
	(b) Hybrid Seeds	Rs. 5000	Qtl	**4450**	**222.5**	**785**	**25.21433**
	Sub-total 2(a)and 2 (b)			**10950**	**320**	**824.2**	**27.17433**
3	(a) Project Management Team at District level		No. of District				
	(b) Project Management Team at State level						
	Sub-total 3(a)and 3 (b)						
	Sub-total 1 to 3				**1536**	**20808.2**	**236.8111**

4. NFSM-Commercial Crop-Cotton

S.No.	Intervation	Unit cost (Rs.)	Targets Proposed by state		Total			
					Target		Achievement	
			Physical (Ha.)	Financial (Rs. In Lakh)	Phy.	Fin.	Phy.	Fin.
1	FLD on ICM	7000/	229	16.03	229	16.03	147.20	0.68
2	FLD on Deshi and ELS Cotton	8000/	100	8.00	100	8.00	10.00	0.19
3	FLD on Intercropping	7000/	400	28.00	400	28.00	74.40	0.31
4	Trials on HDPS	9000/	200	18.00	200	18.00	57.20	1.07
Total			**929**	**70.03**		**70.03**		2.25

5. NFSM- Commercial Crop-Sugarcane

Demonstration on Intercropping and Single bud chip Technology with Sugarcane

Phy. Ha & Rs. In Lakh

S.no	DISTRICT	Target		Achivement	
		Phy.	Fin.	Phy.	Fin.
1	NARSINGHPUR	60	4.80	-	-
2	HARDA	40	3.20	-	-
3	HOSHANGABAD	30	2.40	-	-
4	BETUL	20	1.60	-	-
5	KHARGONE	20	1.60	-	-
6	BARWANI	30	2.40	-	-
7	BURHANPUR	20	1.60	-	-
8	GWALIOR	20	1.60	-	-
	SubTotal	**240**	**19.20**	-	-
1	Training at state level	4	1.6	-	-
	Grand Total	-	**20.80**	-	-