

## **NIRD; RKVY Monitoring Unit, Delhi**

### **Analytical Report on Karnataka SAP**

#### **1. Name of the State**

Karnataka

#### **2. What target the State decided to achieve using RKVY assistance during 11<sup>th</sup> Five Year Plan (FYP) for the agriculture sector as a whole and for the sub sectors?**

The SAP states that the State targets to achieve 4 per cent growth in agriculture & allied sectors during 11<sup>th</sup> Five Year Plan, using RKVY assistance. The SAP proposes several projects under RKVY to fulfill the State's aim/targets during the plan period. For example, under the *Suvarna Krishi Honda* project, the SAP targets construction of 2,50,000 farm ponds or *Suvarna Krishi Hondas* (with an impounding capacity of 1,07,000 litres) by providing a subsidy of Rs 9800/- per unit to encourage the marginal and small farmers. Targets from various other projects include, increasing the productivity of over 4.0 lakh hectares of problematic soils with development of salt tolerant transgenic crop varieties; creation of cold chain facilities for export of pomegranate and other horticulture crops by covering 1000 acres of land for the cultivation of export quality pomegranate fruits covering about 500 farmers and another 500 acres for cultivation of other horticultural crops; creating additional seeds processing capacity of 1.30 lakh quintals by setting 13 *Seeds Processing Units/Seeds storage godowns* (for processing, seeds treatment, seeds testing, certification of certified and foundation seeds); increasing seed replacement rate from 20 per cent in 2008-09 to 33 per cent in 2011-12 by distributing 28,61,542 quintals of seeds at subsidized rate during the plan period; motivation and support to farmers for farm-mechanization through timely subsidy and training and thereby reap benefits in terms of savings of 5 to 20 per cent in seeds, 15 to 20 per cent in fertilizers, increase of 5 to 20 per cent in cropping intensity, rise of 10 to 15 per cent in productivity and increased gross returns to farmers by 30 to 50 per cent; production of one million genuine quality planting material, production of 80 to 100 tonnes of quality bio-inputs, conservation of 750 species of horticultural crops and training to 5000 farmers per annum, through establishment of four integrated bio-centers in the State; etc.

Overall, the SAP targets to increase the production of total cereals from 87.06 lakh tonnes during base year 2006-07 to 141.84 lakh tonnes in 2011-12 (an increase by 62.9 per cent) by raising average yield of cereals from 1805 kilograms per hectare in 2006-07 to 2775 kilograms per hectare in 2011-12 (an increase of 53.7 per cent). The SAP targets to increase total food grain production from 95.77 lakh tonnes in 2006-07 to 161.82 lakh tonnes in 2011-12 (an increase of 68.97 per cent) by raising average yield of total food grains from 1363 kilograms per hectare in 2006-07 to 2211 kilograms per hectare in 2011-12. Further, it aims to increase production of total oilseeds from 11.25 lakh tonnes in 2006-07 to 31.92 lakh tonnes in 2011-12 (an increase of 183.73 per cent) by raising average yield from 503 kilograms per hectare in 2006-07 per hectare to 1354 kilograms per hectare in 2011-12 (an increase of 169.1 per cent). The SAP targets to increase the yield of rice and total pulses from 2750 kilograms per hectare and 396 kilograms per hectare in 2006-07 to 4653 kilograms per hectare and 913 kilograms per hectare in 2011-12 (an increase of 69.2 per cent and 130.5 per cent), respectively. The SAP also targets to increase the production of fruits, vegetables, condiments & spices and medicinal crops from 19,56,992 tonnes, 21,73,948 tonnes, 4,32,082 tonnes and 1,974 tonnes in 2006-07 to 46,75,351 tonnes, 46,31,256 tonnes, 10,00,943 tonnes, and 4,537 tonnes in 2011-12, respectively. It targets to increase milk production by 49.1 per cent to 6148 thousand tones, egg production by 17.2 per cent to 22863 lakh numbers, meat production by 57.7 per cent to 168.08 thousand tones and wool production by 132.5 per cent to 130.18 lakh kilograms, in 2011-12 over the base year values for year 2006-07. It targets to increase the area under sericulture by 36.1 per cent to 1.33 lakh hectares and sericulture production by 198.8 per cent to 1.75 lakh tones, in year 2011-12 vis-à-vis base-year 2006-07 values. It targets to increase area under watershed development schemes from 47.03 lakh hectares to 70.76 lakh hectares and number of beneficiaries from 6,136 to 1,88,180 at the end of 11<sup>th</sup> five-year plan period over base-year values of 2006-07. Thus, very elaborate targets are fixed to attain the overall growth of 4 per cent per annum in agriculture & allied sectors.

**3. Which method (Method 1 or Method 2) is used for the preparation of SAP? How integration (methodology) of C-DAPs and prioritizing major interventions was done to prepare SAP?**

The SAP mentions about the identification of the *Institute for Social and Economic Change* (ISEC), Bangalore by the Government of Karnataka as the *Technical Support Institution* and the

coordinating agency for the formulation of Comprehensive District Agricultural Plans (C-DAPs) for the 29 districts of the State and for the consolidation and preparation of Comprehensive State Agricultural Plan (C-SAP) for the Eleventh Plan Period. It further states that under ISEC's expertise the C-DAPs have been formulated by the District Agriculture Departments. The C-SAP has been prepared by the ISEC, Bangalore. However, it is not explicit in the SAP that the *State Agriculture Department* has shared the ISEC/ District Agriculture Departments about the State's priorities, targets and resources that ought to be reflected in the C-DAPs. Hence, we may conclude that the *Method 1* is used for the preparation of SAP.

The SAP also mentions that it is prepared by integrating the physical and financial targets of all the C-DAPs. The SAP attempts to provide a consolidated and detailed picture of the respective vision statements, the drivers of growth and the contemplated innovative schemes taken from the C-DAPs. It discusses major interventions and targets formulated in the C-DAPs, with focus on common issues presented by districts.

**4. Whether SAP has critically analyzed and clearly stated the agricultural situation of the state vis-à-vis its districts through a SWOT analysis covering agro-climatic conditions, natural resources, infrastructure, institutions, technologies, manpower etc**

The SAP has critically analyzed and clearly stated the agricultural situation of the state vis-à-vis its districts through a SWOT analysis covering agro-climatic conditions, natural resources, infrastructure, institutions, technologies, manpower etc. While SWOTs are not classified in a systematic manner for the State as a whole, the same is well done at the district-level and given under the *consolidated SWOT analysis by districts* in the SAP. The main strengths include, soil and agro-climatic conditions favorable for growing horticultural crops, raising livestock, poultry farming and dairy farms; a well-diversified agriculture with cultivation of all-most all crops grown across the country; effective leadership of the State to put in place all the relevant policy directions to guide the State agriculturalists to act in the right perspective (for example, Land Reforms, implementations of the 73<sup>rd</sup> and 74<sup>th</sup> Amendment Act with regard to decentralization, the first State to create a WTO cell to prepare the State for the international competition and has come out with the Karnataka Agricultural Policy 2006), and the adoption of sericulture activities by all the districts in the State due to favorable soil. The main weaknesses include, monsoon dependent agriculture with very low percentage of area under irrigation (26 per cent

in 2004-05 as compared to 41.6 per cent at all-India level), non-uniform distribution of rainfall across space and time, low crop yields, increasing marginal and small holdings, limited availability of quality seeds, inadequate agricultural marketing infrastructure, and the unsatisfactory availability of timely and adequate agricultural credit. The main opportunities include, an increasing trend emerging in the value added agricultural sector and hi-tech agriculture like horticulture, floriculture, agro-processing products, fisheries and other allied sectors; exports of agricultural commodities like rose, onion, silk products, gherkins are quite promising and indicative of a trend in future; and the availability of a lot of data/information on agriculture & allied sectors at *taluk*, district and State levels, generated during exercise of preparing C-DAPS and SAP, is useful for planning, monitoring and execution of projects. The threats include, a large area in the State is affected by drought - the frequent incidence of droughts compels the farmers to shift cultivation from high water intensive crops like paddy and sugarcane to less water intensive crops like jowar and maize, which are low-value high-risk crops; fragmentation of land-holdings; the depletion of soil fertility by abuse of soil, inadequate environmental support, and depletion of vegetative coverage have resulted in increased cost, low quality and low productivity and thus less income to the farmers; and volatility of market prices.

**5. Whether Convergence- inter and intra department/programmes- been attempted and what is the extent of convergence? Have all potential options for convergence been identified and explored?**

The SAP gives a clear impression that the convergence- inter and intra department/programmes- has been attempted to a maximum possible extent. There are a number of examples of RKVY projects having convergence of RKVY with other schemes/sources. The project on *Creation of Post-Harvest Infrastructure in Karnataka to Increase Agriculture and Horticulture Exports* is implemented by the *Karnataka State Agricultural Produce Processing and Export Corporation Ltd (KAPPEC)*. This project is divided into two projects. The first project on *creation of cold chain facility for export of pomegranate and other horticultural produce in Koppal district* has a total project cost of Rs 833.05 lakh of which the RKVY's grant is to the extent of Rs 222 lakh. The second project on *establishment of fruit and vegetable processing (IQF) facility in Dharwad district* is a joint venture project in PPP mode between KAPPEC and

Tropical Foods Private Ltd. The project-cost is Rs 1,058 lakhs. The total paid-up equity capital of the joint venture is Rs 300 lakh of which the RKVY's equity share is 26 per cent i.e., Rs 78 lakh.

The SAP states that the RKVY project *Revitalizing Agriculture Extension System for Accelerating Agriculture Growth in Karnataka and Karnataka Farmers' Participatory Extension Programmed* which involves total cost of Rs 511.75 crores, is converged with the Agricultural Technology Management Agency (ATMA) Scheme.

The RKVY project *Karnataka Seed Mission* (at a total cost of Rs 589.86 crore) is implemented in all the districts barring 5 districts i.e., Belgaum, Chickmagalur, Kodagu, Hassan and Shimoga districts where seeds distribution is being carried out under PMRP programmed and hence not considered under RKVY.

The proposed RKVY project *setting up of a Tomato Processing Unit in Malur, Kolar district*, is under PPP mode and costs Rs 310.25 lakh. To meet the equity requirement of Rs 200 lakh for the project, the KAPPEC proposes to contribute Rs 98 lakh (i.e. 49 per cent under RKVY).

The project *Augmenting Animal Vaccine Production* under RKVY is essentially for strengthening of biological production division of the only State Biological Institute catering to livestock of the State namely the *Institute of Animal Health and Veterinary Biologicals (IAH & VB)* for increased production of vaccines for total health coverage of livestock and poultry of rural farmers.

In the project *Establishment of Post-Harvest Management and Processing Units for Horticulture Crops* under RKVY, the government provided allocation for year 2009-10 of Rs 100.00 lakh is inadequate to meet the demands; consequently the project proposes to provide 25 per cent assistance under RKVY. These examples indicate that the SAP seems to have done a good job to identify and explore potential options for convergence.

**6. Has the experience of on-going CSS and state schemes been studied and lessons learnt have been incorporated in SAP/C-DAPs for replication/ expansion/ modification in uncovered areas?**

The SAP gives information about other on-going CSS and state schemes while elaborating projects under RKVY scheme. The SAP attempts a significant level of convergence of RKVY scheme with other on-going schemes. The SAP involves a separate chapter on *review of agriculture in Karnataka during tenth five-year plan*, in which it touches upon various programmers undertaken during that period. The SAP gives a strong indication that the

experience of on-going CSS and state schemes have been studied and lessons learnt have been incorporated in SAP/C-DAPs for replication/ expansion/ modification in uncovered areas. Further, the SAP seems to be particularly guided by the *Karnataka Agriculture Policy 2006*.

**7. Whether the yield gaps and returns in different crops/livestock/fisheries have been estimated?**

A systematic analysis of yield gaps and returns either at district level or at the State level is not explicit in the SAP. However, the SAP gives yield rates of major food-grain crops (rice, wheat, total coarse cereals, jowar, bajra, maize, total pulses and red gram) and oilseed crops (total oilseeds, groundnut and sunflower) along with cotton and sugarcane, for year 2006-07 for the Karnataka State vis-à-vis at all-India level. Further, it gives target yields to be achieved by the end of five-year plan in 2011-12, for all the districts for major crops. It also gives actual yields in year 2006-07 of top five districts vis-à-vis targeted yields in 2011-12 of top five districts in terms of high yields for the major crops.

**8. How the technological and agronomic gaps were identified to contribute to yield gaps?**

The SAP states that the preparation of respective C-DAPs by the district agriculture departments of all 29 districts involved a systematic exercise resulting in generation of voluminous district-wise basic data on agriculture & allied sectors, which will be useful in filling the huge long-existing information vacuum. The technological and agronomic gaps at district-level are explicit through the SWOT analysis given by the respective districts in the SAP; however, the same is not explicit at the State level.

Though a systematic yield-gap analysis of crops as well as the methodology for identification of technological and agronomic gaps to contribute to yield gaps is not explicit in the SAP, yet it gives the gaps like seed availability, productivity, research, marketing etc. as contributing to the yield gaps, as identified by the districts.

**9. How the identified constraints are adjudged responsible for low crop productivity in general and specific crops in particular? Is it an opinion or stated on the empirical basis?**

The SAP presents a systematic district-level SWOT analysis prepared by the districts. Further, it states that the preparation of C-DAPs involved a systematic exercise that has resulted in

generation of voluminous district-wise basic data on agriculture & allied sectors, useful in filling the huge long-existing information vacuum. Though not explicit, yet we may infer that the exercises leading to preparation of respective C-DAPs might be instrumental in adjudging the identified constraints responsible for low crop productivity. It is not explicit whether the process is based on an opinion or involves an empirical basis.

**10. How the interventions are identified to bridge the gaps in productivity levels?**

The SAP seems to have identified the interventions to bridge the gaps in productivity levels by giving a summary of the innovative schemes proposed in C-DAPs, district-level SWOT analysis and the *drivers of growth* in each district. The innovative schemes proposed by different districts include, quality seed production programmed, micro-irrigation, farm mechanization, bio-fertilizers, post-harvest technology, agro technological parks, organic farming, soil health cards, treatment of acidic soils, bio-fuel parks, modern technology, Integrated Nutrient Management (INM) demonstration, rain water harvesting, capacity-building trainings, use of hi-tech machinery, training for farm-women in post-harvest technology & value addition, etc.

**11. Whether the right strategies have been prioritized to bridge the yield gaps in crop/livestock/fisheries and maximize returns to farmers have been clearly spelt out? Whether the empirical basis for appropriate strategies provided? How far they have been obtained/decided through a consultative process with all the relevant stake holders?**

It is not explicit in the SAP whether right strategies have been prioritized to bridge the yield gaps in crop/livestock/fisheries and maximize returns to farmers. However, the SAP summarizes the strategies given in various C-DAPs for respective districts. It gives glimpses of important strategies/programmes suggested by different districts. It is not explicit in the SAP whether an empirical basis for prioritization of the appropriate strategies has been provided. Again, it is not explicit that how far they have been obtained/decided through a consultative process with all the relevant stake holders.

**12. Whether the prioritized strategies have been translated into programmes/projects/activities by sectors and years with clear cut objectives, targets, output, outcome, funding (RKVY, other**

**sources) for each project? Whether the viability of each project to achieve the expected output considered?**

The SAP neither systematically enumerates strategies nor their prioritization is explicit in it. However, the SAP accepts the influence of the *Karnataka Agriculture Policy 2006* in formulating various projects under RKVY. The SAP provides information on projects under RKVY, approved by SLSC for years 2007-08, 2008-09 and 2009-10, respectively. It gives project details with clear cut objectives, targets, output, outcome, funding (RKVY, other sources) for each project.

The SAP gives clear indication of considering viability to achieve the expected output in some projects.

**13. Have border areas/ insurgent areas/problem areas (mining, acidic soils etc) have been addressed by formulating any specific projects?**

Yes, the SAP does address problem areas in the State through provisions in its projects under RKVY. For example, Rs 50.0 crore have been proposed for various interventions to the *Centre for Agricultural Biotechnology*, that include programmed on aerobic rice (for developing less water consuming, high yielding rice cultivars – expected to substantially save irrigation water in large number of drought prone districts in the State) and the development of salt tolerant transgenic crop varieties (for enhancing productivity of over 4.0 lakh ha of problematic soils in the State).

**14. What is the mismatch (difference between estimated budget in SAP/C-DAP and the approved and used budget) between the projections and funding in SAPs/C-DAPs and the projects (difference between planned projects in SAP/C-DAP and approved projects and funding being implemented)? How this mismatch affects the targets, expected outputs/outcomes/growth impact?**

The SAP proposes an outlay of Rs 14,617.7 crores for the full five-year plan period (2007-08 to 2011-12) by integrating all the 29 C-DAPs. The SAP gives proposed allocations for all five years divided into 15 sectors. Summing the values for the given 15 sectors provide us total proposed allocations resulting from integration of all C-DAPs. It proposes to allocate Rs 2896.14 crores, Rs 3018.21 crores, Rs 2866.15 crores, Rs 2855.87 crores and Rs 2981.33 crores for years 2007-08, 2008-09, 2009-10, 2010-11 and 2011-12, respectively. However, information on approved budget with respect to proposed outlays from integrated C-DAPs is not available. Hence, we

cannot find the mismatch. Further, the SLSC has approved 9 projects worth Rs 676.06 crores during 2007-08, 17 projects worth Rs 1825.19 during 2008-09 and 23 projects worth Rs 103.06 crores during 2009-10 under RKVY Stream I. For RKVY, the SAP does not give proposed allocations, rather gives approved allocations amounting to Rs 2,648.61 crores forming just 18.1 per cent. As stated, this cannot determine the mismatch. A perusal of the sanctioned projects during 2007-08 to 2009-10 with the vision, constraints and targets identified by the districts in their C-DAPs do not explicitly indicate perfect correlation. However, it is stated in the SAP that the projects selected match with the problems and issues at the State level. The SAP also admits that the selected projects may not address certain problems identified as important at the district level.

**15. Are the projects/programmes large enough, instead of being small and prolific pilot type schemes, to make a visible (impact) in the sectors?**

Apart from the huge allocations proposed under the integrated C-DAPs, the State level RKVY scheme too involves some big projects. For example, the *Suvarna Krishi Honda* project that targets construction of 2,50,000 farm ponds (Rs 250 crores), *Strengthening Agricultural Marketing and Agri Business Management in Karnataka* (Rs 50.0 crores), *Strengthening of Transfer of Technology System in Karnataka* (Rs 100.0 crores), *Establishment of Village Knowledge Centers in Karnataka* (Rs 27 crores), *Participatory Seed production for Food Security and to improve Socio-Economic Status of Farming Community in Karnataka* (Rs 50.0 crore), *Creation of Post Harvest Infrastructure in Karnataka to increase Agri/Horticulture Exports* (Rs 75.06 crores), *Establishment of Seeds Processing Units* (Rs 24.0 crores), *Karnataka Seed Mission* (Rs 589.86 crores), *Revitalizing Agriculture Extension System and for accelerating Agricultural Growth in Karnataka ND Karnataka Farmers*; and *Participatory Extension Programmed* (Rs 511.75 crore).

**16. Has the SAPs identified Flagship programmes (extensive to cover large part of the state and larger area)?**

The State Plan does not explicitly mention Flagship programmes. However, the SAP does propose some large projects like *Karnataka Seed Mission* (Rs 589.86 crores) and *Revitalizing Agriculture Extension System and for accelerating Agricultural Growth in Karnataka ND Karnataka Farmers*; and *Participatory Extension Programmed* (Rs 511.75 crore), that may considered as Flagship programmers.

**17. Whether sectoral and spatial allocation of funds conforms to equitable and optimal distribution of resources?**

The top sectors in terms of proposed allocations are agriculture (19.11 per cent), watershed development (18.15 per cent), horticulture (11.92 per cent), minor irrigation (11.85 per cent), rural development –panchayath raj (9.28 per cent), animal husbandry (9.03 per cent) and agricultural marketing (8.49 per cent). The sectoral and spatial allocations are based on the C-DAPs prepared by the respective district agricultural departments. These represent aspirations of the respective districts in terms of their planned targets for 15 agriculture & allied sectors. Sectoral allocation seems to be in order. Agriculture sector, being the largest sector both in terms of providing employment and value-addition, deserves largest share of 19.11 per cent. Second largest share of 18.15 per cent in total proposed allocations is that of watershed development. This is expected as only 26 per cent of the State's agricultural area is irrigated vis-avis 41.6 per cent at all-India level. Moreover, a large area of the State is frequently prone to drought. The State is strong in cultivation of horticulture crops and vast scope for exports of horticulture produce exists in the State, hence third highest share of 11.92 per cent to the sector. As for spatial allocation of funds, the coefficient of correlation between district-wise proposed allocation and the respective district-population is good and positive (+0.47). Thus, spatial allocation was nearly optimal.

**18. Are there any innovative projects? If so, how do they contribute to fulfill the special needs outside ongoing programs?**

The SAP mentions a number of innovative schemes proposed in C-DAPs of various districts. The innovative schemes proposed by different districts include, quality seed production programmed, micro-irrigation, farm mechanization, bio-fertilizers, post-harvest technology, agro technological parks, organic farming, soil health cards, treatment of acidic soils, bio-fuel parks, modern technology, Integrated Nutrient Management (INM) demonstration, rain water harvesting, capacity-building trainings, use of hi-tech machinery, training for farm-women in post-harvest technology & value addition, etc. The proposed innovative schemes are expected to supplement the on-going programs.

**19. What is the basis of planning certain projects for the State as a whole and how do they get monitored?**

Most projects under RKVY are planned for the State as a whole as they are targeted to fulfill the requirements of the State, identified by the State Agriculture Department. Examples of such projects include, the *Suvarna Krishi Honda* project that targets construction of 2,50,000 farm ponds (Rs 250 crores), *Strengthening Agricultural Marketing and Agri Business Management in Karnataka* (Rs 50.0 crores), *Strengthening of Transfer of Technology System in Karnataka* (Rs 100.0 crores), *Establishment of Village Knowledge Centers in Karnataka* (Rs 27 crores), *Participatory Seed production for Food Security and to improve Socio-Economic Status of Farming Community in Karnataka* (Rs 50.0 crore), *Creation of Post Harvest Infrastructure in Karnataka to increase Agri/Horticulture Exports* (Rs 75.06 crores), *Establishment of Seeds Processing Units* (Rs 24.0 crores), *Karnataka Seed Mission* (Rs 589.86 crores), *Revitalizing Agriculture Extension System and for accelerating Agricultural Growth in Karnataka ND Karnataka Farmers*; and *Participatory Extension Programmed* (Rs 511.75 crore). However, how do they get monitored, is not explicit in the SAP.

**20. What is the basis of sectoral fund allocation? Is it based on expected marginal contributions? Any viability analysis is made?**

The basis of sectoral fund allocation is not made explicit in the SAP. However, in case of integrated C-DAPs, the sectoral allocations are provided in the C-DAPs by the respective district agricultural departments. These in general, represent the planned targets for 15 agriculture & allied sectors of different districts. For RKVY projects, the SAP seems to have given weightage to the recommendations of the *Karnataka Agricultural Policy 2006*, as the SAP admits the influence of the agricultural policy throughout the preparation of SAP. It is not explicit whether the sectoral allocation is based on expected marginal contribution. There is no reference to viability analysis in the SAP.

**21. Whether the allocations across years were right? What was the basis for yearly allocations?**

The proposed allocations are almost same across all years in case of the integrated C-DAPs; the proposed allocations are Rs 2896.14 crores, Rs 3018.21 crores, Rs 2866.15 crores, Rs 2855.87 crores and Rs 2981.33 crores for years 2007-08, 2008-09, 2009-10, 2010-11 and 2011-12, respectively. Normally, in the first year, at the inception stage funding requirement is relatively low as the capacity to use funds is lower in the beginning. It rises with progress of the projects. During the intermediate years greater funding provision secures successful completion of the project. These integrated proposed allocations are based on the C-DAPs prepared by the

respective district agricultural departments. However, only 9 RKVY projects were selected in the first year, but 19 in second year and 23 in the third year.

**22. Is the SAP in line/ tune with overall agricultural strategy and goals of the country/ state?**

The SAP seems to be in line/ tune with overall agricultural strategy and goals of the country/ state. Both the integrated C-DAPs and the RKVY projects are an attempt in that direction. The RKVY projects stress on availability of improved availability of quality seeds through projects like *Karnataka Seed Mission* (Rs 589.86 crores), irrigation availability to small/marginal farmers through *Suvarna Krishi Honda* project that targets construction of 2,50,000 farm ponds (Rs 250 crores), extension services through *Revitalizing Agriculture Extension System and for accelerating Agricultural Growth in Karnataka ND Karnataka Farmers*; and *Participatory Extension Programme* (Rs 511.75 crore) and high-value horticulture sector through *Creation of Post Harvest Infrastructure in Karnataka to increase Agri/Horticulture Exports* (Rs 75.06 crores). The integrated C-DAPs allocate a high 18 per cent to watershed development and 11.9 per cent to horticulture. This is also in line with the country's target of achieving 4 per cent growth rate during 11<sup>th</sup> five-year plan with emphasis on better seed, more water, strengthening extension system, horticulture etc.

**23. Whether mechanisms for planning, baseline information collection, monitoring, documentation and regularly reporting progress are clearly spelt out?**

Though the SAP mentions of exercise on data-collection undertaken during C-DAP preparation, yet it is not explicit on the mechanisms for planning, baseline information collection, monitoring, documentation and regularly reporting progress. However, actual information for year 2006-07 on various agricultural parameters as area, production and yield for various crops at district and State levels is given in the SAP vis-a-vis the targets for 11<sup>th</sup> five-year plan.

**Directions for 12<sup>th</sup> FYP**

- 1. Whether the planning, monitoring and evaluation mechanisms exist, functional and made use of to fulfill the expectation and bridge the gaps? If not, what is the plan for strengthening PME mechanisms and making them functional during the remaining years of 11<sup>th</sup> FYP and 12<sup>th</sup> FYP**

**when it gets launched? Whether the baseline information is maintained for comparison of performance of the project later?**

Though the SAP mentions of exercise on data-collection undertaken during C-DAP preparation, yet it is not explicit on the mechanisms for planning, baseline information collection, monitoring, documentation and regularly reporting progress. However, actual information for year 2006-07 on various agricultural parameters as area, production and yield for various crops at district and State levels is given in the SAP vis-a-vis the targets for 11<sup>th</sup> five-year plan.

Also, there is no mention of plan for strengthening PME mechanisms and making them functional during the remaining years of 11<sup>th</sup> FYP and 12<sup>th</sup> FYP when it gets launched. It is not mentioned whether the baseline information is maintained for comparison of performance of the project later.

**2. Whether the mid-term evaluation by the external agency is done for change of the targets and inter-sectoral resource adjustments?**

It is not mentioned.

**3. Is social audit done to facilitate publicity on status of the implementation and maintenance of transparency?**

It is not mentioned.

**4. What are the major lessons from RKVY implementation in the State for the 12<sup>th</sup> FYP?**

**(i)** The SAP should provide year-wise funding details under various CSS and State-level schemes (including RKVY) for the five-year plan period. If not given, analyzing the extent of convergence of existing schemes with the RKVY will be difficult. Convergent approach within the sector and outside the sector should be attempted, particularly with MGNREGS to avoid duplication in respect of soil and water harvesting and conservation. MGNREGS resources can be tapped for this. The SAP should come out with more interventions to concentrate on cropping and production systems including horticulture, livestock and fisheries in areas that have been developed under watershed and NRM programs/schemes.

**(ii)** The main experiences of implementing CSS/State schemes should be summarized and whether/how they are made use of to prepare SAP for replication, expansion etc should be stated.

**(iii)** Prioritization of interventions needs to be attempted using standard objective methods.

(iv) The project proposals should emanate from Districts preferably Zilla Parishads on the basis of C-DAPs.

(v) There should be rigorous filtering of project proposals by an expert Committee earlier and in SLSC meetings later.

(vi) There should be a dedicated PM&E mechanism at the State level for facilitating project screening, database management, monitoring, evaluation and reporting of RKVY projects. It should facilitate mid-term evaluation by external agency and also social audit to facilitate publicity and maintenance of transparency.

(vii) The SAP should give sectoral allocation of funds and expected outcomes of implementing proposed interventions (schemes) at the State level.

(viii) The SAP should explicitly mention target for agriculture & allied sectors / sub-sectors to be achieved using RKVY funding during 11<sup>th</sup> five-year plan.

(ix) The SAP should provide yield-gap estimates, both at State and district-level, for major crops and other enterprises.

(xi) The C-DAPs are well-prepared as per the Planning Commission guidelines and contain detailed information on the districts and specific projects. These data will be very helpful for all future planning exercises.

(xii) The SAP identifies sector-specific constraints and interventions for each district of the State. This is very useful information to propose projects at the district level to address unique constraints of the districts.

### **Overall conclusion**

The SAP is well-prepared with all details. The SAP provides a review of agriculture in the 10<sup>th</sup> FYP. This is important to know the SWOTs of the State in the immediate past. The SAP appears to be an integration all C-DAPs, sector wise and district wise. It also provides district-wise SWOT analysis, sectoral visions of the districts, drivers of growth in key sectors of different districts, innovative schemes under different sectors relevant to each district, district wise outlay by sectors, sector wise outlay by districts etc. It also gives important details on selected RKVY projects during 2007-08 to 2009-10. A separate chapter deals with integration of SAP with RKVY and it tries to provide how RKVY finding compares with overall SAP outlay (district wise as well as sector wise). All these are useful information. It is useful to note that the SAP in the concluding chapter gives the projected impact of different C-DAPs on per capita income of

farming community during 11<sup>th</sup> FYP as compared to 10<sup>th</sup> FYP. Under concluding remarks, it is stated that 49 projects selected under RKVY during 2007-08 to 2009-10 are almost appropriate and address the right problems and issues of the State. In a sector like agriculture, such generalizations at a broader state level may not be fully untrue but the fact remains that the selected projects, in the spirit of RKVY, should emanate from the district level to remain primarily relevant to the district though they are to be consistent with SAP also. The SAP states that the districts are required to prepare a shelf of projects for posing to SLSC. The SAP itself admits this omission by stating that some specific issues identified by some districts could not be captured in the selected projects. This needs attention during 12<sup>th</sup> FYP. The SAP should also state that how the technological and agronomic gaps are identified. Further, it should throw light on the methodology for judging the identified constraints responsible for low crop productivity in general and specific crops in particular. It is also necessary to enumerate how the interventions are identified to bridge the gaps in productivity levels. The PM&E mechanisms including baseline information collection, documentation and regularly reporting progress need to be planned. These may receive greater attention in the 12<sup>th</sup> FYP.