

## EXECUTIVE SUMMARY

### 1. Project in Brief

#### a. Location-

Nandur Madhameshwar irrigation project envisages the construction of four dams namely Mukane, Bhawali, Waki and Bham Dam in Godavari river basin in Igatpuri Taluka, Nasik district which includes modernization of existing Nandur Madhameshwar pickup weir in Taluka Niphad, District Nasik

#### b. Components -

##### I) Upstream storages:

There are four Storage dams upstream of existing Darna dam:

- a) Bhawali storage dam across river Darna with gross storage of 44.75 Mcum and live storage of 40.79 Mcum
- b) Waki storage dam across Waki nalla with gross storage of 58.45 Mcum and live storage of 55.96 Mcum.
- c) Bham storage dam across Bham nalla with gross storage of 75.42 Mcum and live storage of 69.76 Mcum
- d) Mukane storage dam across Aundha Nalla down-stream of the existing Darna dam with gross storage of 139.76 Mcum and live storage 122.48 Mcum respectively.

##### II) Modernization of existing Nandur Madhameshwar Weir at Niphad Dist. Nasik.

##### III) A Lined canal 125 Km long off- taking from the left flank of the Nandur Madhameshwar weir to irrigate 43,860 ha annually.

##### IV) Previously there were two canals proposed one on each flank, off- taking from the Bhawali dam of L.B.C. lengths 3.00 Km and R.B.C. 8.34 km to irrigate 1263 ha annually.

The first phase of the Nandur Madhameshwar project NM-I was included under AIBP during the year 2006-07 with Bhawali Dam, modernization of Nandur Madhameshwar (NM) Weir and NM Lined canal as its components. The Bham and Waki dam have been included in the second phase of the AIBP in 2009-10. Mukane Dam was completed before NM-I

#### c. Benefits

The Ultimate Irrigation Potential (UIP) of project is 45,123 Ha in Nasik, Ahmednagar and Aurangabad districts of Maharashtra State. The project was under AIBP phase I during the year 2006-07 to 2009-10 with a target Irrigation potential of 24,623 Ha. This was fully achieved. The target Irrigation potential for Phase II is the balance 20500 Ha of potential (Waki – 8940 Ha and Bham – 11560 Ha).

**d. Estimated Cost & Year of Approval**

The project was approved by Government of Maharashtra for Rs.48.70 Crore in 1979. Thereafter, the Project was first approved by Planning Commission for Rs.72.66 Crore in the year 1981 vide letter No 2(190)801 & CAD dated 7th May 1981. Further Planning Commission has approved the project for a revised estimated cost of Rs. 941.33 Crore in 2009 vide No. 2(190)/ 2007- WR dated 17th April 2009.

Now the cost of revised estimate of Nandur Madhameshwar Project for Rs. 1482.08 Crore (PL 2013-14) is finalized by the Central Water Commission, New Delhi vide letter No. Maha /74/2007-PAC/836-37, dated 08.08.2014. It has been informed by the authorities during the visit that the project was put up for consideration in the 124<sup>th</sup> Technical Advisory Committee of Ministry of Water Resources, Govt. of India on dated 16.10.2014 but the discussion could not be held due to non availability of State Finance Concurrence letter of Govt of Maharashtra.

**e. Inter State aspects:** There are no Inter State aspects in this project.

**f. Year of start**

The earlier Nandur Madhameshwar project was constructed in 1907-16 and comprised of Darna reservoir across river Darna and a pick-up weir at Nandur. For the present project, the first clearance from Planning Commission was taken in May 1981. Project had received Central Assistance (CA) under AIBP of Rs 218.702 Crore under (NM-I) from 2006-07 to 2009-10. Thereafter, it has been receiving CA under (NM-II) from 2009-10.

**g. Targeted date of completion**

As per the last approval for revised cost given by Planning Commission in May 2009, as well as last MoU attached with the CA proposal of 2013-14, it was proposed to be completed by 03/2013 (Waki Dam by 3/2012 and Bham by 3/2013).

It has been informed by the authorities during the visit that, the revised estimate has been prepared by State Govt. & submitted to CWC. CWC finalized the revised estimate for Rs. 1482.08 Crore (PL- 2013-14). But due to non availability of SFC, the RE could not be placed for consideration of TAC of MoWR. As per revised proposal the balance work of Waki and Bham Dam proposed to be completed by 3/2016. However, the approval of the competent authority for revised estimate as well as time extension is yet to be received.

**h. External source of funding:** There is no external source of funding in this Project.

**2. Organizational and Management aspects**

The Godavari Marathwada Irrigation Development Corporation (GMIDC), Aurangabad is executing the project after its formation in 1998. Normally all the construction activities are being done through outsourcing. The work of construction of storage dams of Waki and Bham are being outsourced by the Executive Engineer, Nandur Madhameshwar Project Division, Nasik under supervision of Superintending Engineer and Administrator, Command Area Development Authority (CADA), Ahmednagar. One Sub-Division for Waki & Two Sub-

Division for Bham Dam (for RR & Dam) are stationed, designated for the execution of works. Construction works of dams in Igatpuri Taluka District-Nasik is under the jurisdiction of Chief Engineer, North Maharashtra Region, Nasik. Design & Drawings of various components and allied works are being issued by Central Design Organization (CDO) situated in Nasik (Maharashtra State).

### 3. Physical Progress (Upto Oct -2014)

The physical progress of the components is given in the table below.

Table 1: Physical Progress of AIBP components

S.N.	Item	Status of completion
1.	Waki Dam	95 % Completed
2.	Bham Dam	45% Completed
3.	Potential Creation – Waki Dam	Out of 8940 Ha. 3977 ha of Potential has been created.
4.	Potential Creation – Bham Dam	Out of 11560 Ha. NIL Potential has been created.
5.	Potential Utilization – Waki Dam	Nil
6.	Potential Utilization – Bham Dam	Nil

### 4. Financial Progress ( Upto Oct -2014)

The project was approved by Government of Maharashtra for Rs.48.70 Crore in 1979. Thereafter, the Project was first approved by Planning Commission for Rs.72.66 Crore in the year 1981 vide letter No 2(190)801 & CAD dated 7th May 1981. Further Planning Commission has approved the project for revised estimated cost of Rs. 941.33 Crore in 2009 vide No. 2(190)/ 2007- WR dated 17th April 2009.

Now the cost of revised estimate of Nandur Madhameshwar Project for Rs. 1482.08 Crore (PL 2013-14) is finalized by the Central Water Commission, New Delhi vide letter No. Maha /74/2007-PAC/836-37, dated 08.08.2014. However, the GoM yet to accord State Finance Concurrence to the finalized cost hence approval of the revised cost by advisory committee of MoWR & Planning Commission is being delayed.

The expenditure incurred by State Govt. on works component under AIBP is Rs 205.76 Crore up to Oct-2014 and total CA/CLA released by Govt. of India is Rs 175.28 Crore and the State share is Rs 22.72 Crore ( Rs.19.60 Cr upto 3/2014 and Rs.3.12 Cr for 2014-15).

Table-2: The year-wise expenditure incurred on A.I.B.P. components

Year	Total budget (Cr)	State Share (Cr)	CA received (Cr)	Exp. Incurred on works (Cr)
2009-2010	42.00	3.78	34.02	6.96
2010-2011	47.56	0.66	0	31.50
2011-2012	70.00	10.52	94.69*	52.54
2012-2013	95.00	4.64	46.57	52.67
2013-2014	68.00	0	0	48.34
2014-2015 (10/2014)	25.00	-	0	13.75
Total	347.56	19.60	175.28	205.76**

\*CA 94.69Cr received in the year 2011-12 based on the total budget provided (i.e. 47.56+95=117.56 Crore) for the year 2010-11 & 2011-12

\*\* Includes the fund from State Share.

## **5. Issue in Focus**

### **(a) Irrigation Potential Creation**

Nandur Madhameshwar Irrigation Project (II) has the potential creation proposed under AIBP as 20500 ha, out of which 3977 ha partial potential has been created till 10/2014.

It is to point out that the potential creation is not related to construction of canal network as it is already in place. The potential is directly linked to the completion of Waki and Bham Dam. Although Bham Dam is 45% complete, there was no gorge filling. But Waki dam is 95% completed and gorge filling is done. It was informed by the project authorities that there was opposition from PAPs regarding storing of water before they have received full payment.

### **(b) R&R**

There are no serious R&R issues needing attention for Waki dam. However, due to opposition of PAPs the progress of RR work of Bham dam could not achieved. All the three villages namely Bharvaj, Nirpan and three Wadies (Saruktewadi, Borwadi and Darewadi) of Kaluste are yet to be rehabilitated due to displacement from Bham Dam.

### **(c) Environmental Issues**

The conservation of project area environment by adhering to various safeguards is expected to be implemented pari-passu to the execution of the project. The Science and Technology Department, New Delhi cleared Nandur Madhameshwar Project in 1980 with following safeguards to be attended:

- Extensive afforestation in the catchment area
- Compensatory afforestation
- Plantation along the canals.
- Pisciculture by Fisheries Department
- Proper drainage in the Command Area
- Development of tourism
- Preventive measures of Malaria

Accordingly, Project Environmental Management Committee for Nandur Madhameshwar Project has been formed under the Chairmanship of the Chief Engineer, North Maharashtra Region vide GR No.ENV/1092/361/(61/92) WRI (PL) dated 25/8/1992. The committee conducted its last meeting on 18.01.2007 and reassembled on 06.09.2011.

**The Project Authorities should earnestly implement the environmental safeguards & State Level Committee needs to monitor the environmental issues of the project.**

**(d) CADWM**

The total cost of CADWM is Rs 153.33 cores and was cleared by GOI on dated: 18.02.2010. The MoU is signed between the MoWR, GoI & GoM, for the completion of NMC CAD project in 6 years, for Rs 135.24 Crore, of CCA 49864 Ha. It may be noted that the information on CADWM has been collected after the visit. Upto March 2014, the work of field channel is completed on the area 22175 Ha. & expenditure incurred on this work is Rs. 35.59 Crore. This information was received from the Nandur Madhameshwar Canal Division, Vaijapur.

## STATUS REPORT

The Project was visited by Director, Monitoring & Appraisal Directorate, Central Water Commission, Vadodara on 17<sup>th</sup> November, 2014 along with Deputy Director and discussions were held with Project officials. This report is prepared based on the inputs received from project officials of the ongoing works and the status of work.

### 1. NANDUR MADHMESHWAR IRRIGATION PROJECT

Nandur Madhameshwar irrigation project envisages the construction of four dams namely Mukane, Bhawali, Waki and Bham Dam in Godavari river basin in Igatpuri Taluka, Nashik district which includes modernization of existing Nandur Madhameshwar pickup weir in Taluka Niphad, District Nashik

Before the project was included under AIBP, the Mukane Dam was already completed. The first phase of the Nandur Madhameshwar project (NM I) was included under AIBP during the year 2006-07 with Bhawali Dam, modernization of Nandur Madhameshwar (NM) Weir and NM Lined canal as its components. The Bham and Waki dam have been included in the second phase of the AIBP in 2009-10 and is referred to as NM II.

### 2. PROJECT COMPONENTS

The project has following components:

**a) Mukane Dam** - Mukane dam is a composite dam (1576 m length and 26.93 m height) with gross storage 139.76 Mcum, live storage 122.48 Mcum and dead storage as 17.28 Mcum across river Aundha in Godavari Basin near village Mukane in Igatpuri Taluka of Nashik district. The work on the dam was started in 1986 and was completed in June 2006. It was completed before the project came under AIBP

**b) Bhawali Dam** - It is 1157 m long and 31.28 m high composite dam with gross storage 44.75 Mcum & live storage 40.79 Mcum across river Darna in Godavari basin near village Bhawali in Igatpuri Taluka of Nashik district. Its work was started in April 1999 and it's complete.

**c) Modernization of Nandur Madhameshwar Weir** - Modernization of Existing Nandur Madhameshwar Weir work is reportedly complete. After Modernization, the weir is capable of feeding N.M.Canals to its fullest potential to irrigate 43860 ha of land.

**d) Nandur Madhameshwar Express Canal** - Nandur Madhameshwar Canal off-takes from Left Bank of the existing Nandur Madhameshwar Pick-up Weir 15.70 km D/S of existing Darna dam and is of 125 km long fully lined canal with discharge capacity 31.03 cumecs at the head. Two branch canals, each of 18 km length, off-taking from its tail end are unlined. The UIP of this canal is 43860 ha. It is complete.

**e) Waki Dam** - The Waki dam is also a composite dam (1151 m-length and 34.45 m-height) with gross storage 58.45 Mcum, live storage 55.95 Mcum & dead storage 2.49 Mcum across river Waki in Godavari basin near village Kurnoli in Igatpuri Taluka of Nashik district. The work on the dam started in December, 1999 and 95 % of the dam including gorge filling completed.

**f) Bham Dam** - Bham dam is a composite dam (1462 m length and 33.97 m height) with gross storage 75.42 Mcum, live storage 69.76 Mcum & dead storage 5.56 Mcum across

Bham River, a sub-tributary of Godavari River near village Kaluste in Igatpuri Taluka of Nashik. The work on the Dam started in 2007 and is under construction.

**g) Distribution Canal and Water Courses** - The work of land acquisition is nearly complete. The work of distribution system is complete upto minors.

The components under each phase are as follows:

Mukane storage dam across Aundha Nalla	: Completed before AIBP
Bhawali storage dam across river Darna	: Completed in AIBP phase I
Nandur Madhameshwar Weir	: Completed in AIBP phase I
NM Lined Canal	: Completed in AIBP phase I
Waki storage dam across Waki nalla	: Ongoing (95% Completed) in AIBP phase II
Bham storage dam across Bhamnalla	: Ongoing (45% Completed) in AIBP phase II

Index map of the project is given at **Plate-I**.

Salient features of the project are given at **Annexure-I**.

### **3. CHANGE IN SCOPE, IF ANY**

The important changes in the scope of the project after it was originally approved are as under

- As per original administrative approval, no direct canal was provided to the Mukane storage, however, due to the persistent demand of local people and legislature, the LBC of 13 km off taking from Mukane Dam to irrigate 453 ha in Igatpuri Taluka has been provided.
- It was also decided to utilize the yield at Mukane Storage on 50% dependability instead of 75% as originally considered resulting in increasing the height of dam by 3.80 m. The Maharashtra Govt. has approved this proposal vide G.R. No. Nandur Madhameshwar-1092/S-1132/(292/92) MP-1 Mantralaya, Mumbai on dated 16.1.1993.
- Waki storage dam has also been planned on 50% dependable yield considering demand of drinking and industrial use.
- The outlets for all the 4 dams were considered as irrigation outlets only as per originally administratively approved project report. However, as per Government policy, the outlets are now considered as to generate hydroelectric power.

Revised DPR has been approved by Planning Commission in 2009 vide No. 2(190)/ 2007- WR dated 17<sup>th</sup> April 2009. The project cost is further under revision & the cost of revised estimate of Nandur Madhameshwar Project for Rs. 1482.08 Crore (PL 2013-14) is finalized by the Central Water Commission, New Delhi vide letter No. Maha /74/2007-PAC/836-37, dated 08.08.2014. However, the GoM yet to accord State Finance Concurrence to the finalized cost hence approval of the revised cost is being delayed.

#### **4. ORGANIZATION SET UP FOR THE PROJECT**

The Godavari Marathwada Irrigation Development Corporation (GMIDC), Aurangabad is executing the project after its formation in 1998. Normally all the construction activities are being done through outsourcing.

The work of construction of storage dams of Waki and Bham are being outsourced by the Executive Engineer, Nandur Madhameshwar Project Division, Nashik under supervision of Superintending Engineer and Administrator, Command Area Development Authority (CADA), Ahmednagar. One Sub-Division for Waki & Two Sub-Division for Bham Dam are stationed, designated for the execution of works. Construction works of dams in Igatpuri Taluka District-Nashik is under the jurisdiction of Chief Engineer, North Maharashtra Region, Nasik.

Design & Drawings of various components and allied works are being issued by Central Design Organization (CDO) situated in Nashik (Maharashtra State).

#### **5. CONTRACTUAL ARRANGEMENTS**

The process of awarding works by calling competitive bids after publishing tender notices in daily newspapers, their finalization as per prevailing rules laid in P.W.D. Manual by Competent Authority is considered adequate. Whenever, extra items of works crop-up, the Engineer-in-Charge negotiate the tentative current rates with the contractor. The mutually agreeable rates are sanctioned from competent authorities and the payment is made accordingly.

The work of entire Waki Dam - Earthen Dam, Spillway, Tail channel and Regular work has been awarded to single agency & in progress under B-1 Tender No. B-1/EE/16 of 1998-99. As per the contract the dam is scheduled to be completed up-to 3/2012. However, it has been informed by the Project Authorities that the Dam is now proposed to be completed by 03/2015 subject to the condition that money is released in AIBP scheme.

The work of entire Bham dam has been awarded vide Award No. NMPD/TC-1419/2007 dated 2.4.2007 in favor of another single agency. In terms of the award, however, the stipulated date for completion of Bham Dam is 9/2013; instead of 03/13 proposed under AIBP. However, it has been informed by the Project Authorities that the Dam is now proposed to be completed by 2015-16 (i.e. 2 years from approval of Planning Commission, New Delhi ) subject to the condition that funds is released in AIBP scheme

#### **6. QUALITY ASSESSMENT**

Separate Quality Control Organization has its Sub-Division and Division at Nasik & Dhule respectively under the control of Superintending Engineer (Quality Control) Aurangabad. The Quality Control Organization maintains agency-wise records and is responsible for ascertaining the quality of works & materials on N.M.Project. The standard tests are carried out and results informed to the concerned working body to take the suitable steps for the assured quality of works. The quality control mechanism is as such, in place.



## 7. LAND ACQUISITION AND R&R

**7.1 Land Acquisition:** It is informed by the project authorities for construction of a dam & RR works, land acquisition is very crucial component as most of the project affected persons are opposed for this. Slow acquisition often becomes the main cause for delay. In the instant case, it is critical for the dam.

**7.1.1 Waki Dam:** In case of Waki it is being done through L.A. Act, 1984. The status of acquisition is given in Table - XI as under:

Table-3: Status of Land acquisition of Waki dam

	Total land required (Ha)	Land acquired up to 10/2014 (Ha)	Balance land to be acquired(Ha)
Total land required	1101.04	1066.36	34.68
a) Submergence	1063.86	1036.86	27.00
b) Rehabilitation	37.18	29.50	7.68

**7.1.2 Bham Dam:** In case of Bham it is being done through private negotiations - mutual consent at market rates. The status of acquisition is given in table as under:

Table-4: Status of Land acquisition of Bham dam

Item	Total land required (Ha)	Land acquired up to 6/2014 (Ha)	Balance land to be acquired (Ha)
Total land required	517.81	402.51	115.31
a) Submergence	472.81	367.00	105.80
b) Rehabilitation	45.00	35.49	9.51

Balance 115.31 ha of land involving about 355 farmers is to be given priority. Out of this, balance 9.51 ha to be acquired for R&R site of Bharvaj & Nirpan villages needs to be accorded special emphasis.

## 7.2 R&R

Resettlement & rehabilitation is another very important factor to be tackled with full fervor & in time, otherwise may delay completion of a project & escalation of entire project-cost. In the instant case, it is to be done as per "Maharashtra Project Affected Person Rehabilitation Act, 1999. The details of PAPs & cost involved are given at **Annexure-II**.

### 7.2.1 Waki Dam:

Five villages namely Pimpalgaon Bhatata and its wadi Shindewadi, Kopargaon, Valvihir its wadies "Bhaupatilwadi, Payarwadi, Khadkwadi and Bhawali (Br)" are affected due to Waki Dam.

The layout of new gaothans of Pimpalgaon Bhatata, Shindewadi, Kopargaon, Valvihir had been sanctioned by Town Planning Department. 90% civic amenities to be provided are completed for Pimpalgaon Bhatata Shindewadi & Valvihir & 90% for Kopargaon, Valvihir new gaothan. The balance work of Rehabilitation is in progress and reportedly planned to be completed by 3/2015. Rehabilitation of village Bhawali (Bk) is approved by Government of Maharashtra vide Marathi letter no. RP/30/1141/R-3 dated 18.7.2008. Land of Bhawali (Bk) village is acquired. The civic amenities are in progress & planned to be complete by 3/2015.

Submergence area plan is shown in **Plate II**

The relocation of 5.5 km long Vaitarna - Ghoti S.H. No. 21 road coming under submergence. The work has completed & opened for traffic in 6/2014.

**7.2.2 Bham Dam:** Three villages namely Bharvaj, Nirpan and three Wadies (Saruktewadi, Borwadi and Darewadi) of Kaluste are to be rehabilitated due to Bham Dam. 14.54 Ha has been acquired for Borwadi and Nirpan Gaothans. The land required for Saruktewadi, Borwadi and Darewadi. 18.73 ha are reportedly transferred from Commissioner (Tribal) Nasik in replacement of land required for Bhawali Dam. It is proposed to complete rehabilitation of above village by 12/2015.

Submergence area plan is shown in **Plate III**

## **8. ENVIRONMENTAL CLEARANCE**

The conservation of project area environment by adhering to various safeguards is expected to be implemented pari-pasu to the execution of the project. The Science and Technology Department, New Delhi cleared Nandur Madhameshwar Project in 1980 and following safeguards were suggested:

- Extensive afforestation in the catchment area
- Compensatory afforestation
- Plantation along the canals.
- Pisci-culture by Fisheries Department
- Proper drainage in the Command Area
- Development of tourism
- Preventive measures of Malaria

Accordingly, Project Environmental Management Committee for Nandur Madhameshwar Project has been formed under the Chairmanship of the Chief Engineer, North Maharashtra Region vide GR No.ENV/1092/361/(61/92) WRI (PL) dated 25/8/1992. The committee conducted its last meeting on 18.01.2007 and reassembled on 06.09.2011.

Out of the reported original provisions of Rs 0.54 & Rs 10.73 Crore under M-plantation & X-Environment & ecology respectively, so far, Rs 0.25 & Rs 3.39 Crore only have been booked. The project estimate is under revision & these provisions may also increase.

## **9. TECHNO-ECONOMIC APPRAISAL AND ESTIMATED COST**

The project was approved by Government of Maharashtra for Rs.48.70 Crore in 1979. Thereafter, the Project was first approved by Planning Commission for Rs.72.66 Crore in the year 1981 vide letter No 2(190)801 & CAD dated 7th May 1981. Further Planning Commission has approved the project for revised estimated costs of Rs. 941.33 Crore in 2009 vide No. 2(190)/ 2007- WR dated 17th April 2009.

Now the cost of revised estimate of Nandur Madhameshwar Project for Rs. 1482.08 Crore (PL 2013-14) is finalized by the Central Water Commission, New Delhi vide letter No. Maha /74/2007-PAC/836-37, dated 8.8.2014. It has been informed by the authorities during the visit that the project was kept for approval in the 124<sup>th</sup> Advisory Committee of Ministry of Water Resources, Govt. of India on dated 16.10.2014 but the discussion is not held due to

non submission of State Finance Concurrence letter of Govt of Maharashtra. The approval of revised cost estimate is being delayed due to not according state finance concurrence by GoM.

## **10. EXTERNAL ASSISTANCE**

Project has not received any external assistance.

## **11. PHYSICAL & FINANCIAL PROGRESS**

### **11.1 Physical Progress**

#### **11.1.1 Waki Dam**

The construction of dam started in 1999 and was included in AIBP in 2009-10 under Phase II. It was stipulated to be completed in 2011-12 but is 95% complete. The gorge filling of Waki dam is completed in 06/2014 and partial potential about 3977 ha has been created. Only the work of spillway concrete piers and gate erection work is balance & proposed to be complete by 3/2015. Irrigation potential of Waki dam is 8940 Ha which is on Nandur Madhameshwar Canal benefiting the drought prone area of Gangapur & Vaijapur Talukas of Aurangabad District. The canal network has been completed in AIBP Phase I. The achievement of potential creation of the existing network is linked with the storage creation of Waki dam.

#### **11.1.2 Bham Dam**

The construction of dam started in 1999 and was included in AIBP in 2009-10 under Phase II. It was stipulated to be complete in 2012-13 but is 45% completed. The dam is proposed to be completed by March 2016. Irrigation potential of Bham dam is 11560 Ha which is on Nandur Madhameshwar Canal benefiting the drought prone area of Gangapur & Vaijapur Talukas of Aurangabad District. The canal network has been completed in AIBP Phase I. The potential creation achievement of the existing network is linked with the storage creation of Bham dam.

The total quantity and year wise achievement of Waki dam & Bham Dam under AIBP is given in the table No: 5

### **11.2 Financial Progress:**

The latest approved cost of the whole project is Rs 941.33 Crore. Now the cost of revised estimate of Nandur Madhameshwar Project for Rs. 1482.08 Crore (PL 2013-14) is finalized by the Central Water Commission, New Delhi vide letter No. Maha /74/2007-PAC/836-37, dated 8.8.2014. Total expenditure incurred on the complete project up to 6/2014 is Rs 992.13 Crore. Expenditure has been done on the basis of revised estimate finalized by CWC. Waki Dam & Bham Dam have been proposed under AIBP (Part-II) with balance cost of Rs.389.40 Crore (Works) out of which Rs 195.41 Cr. (Works portion) of CA released under AIBP Phase II.

The total financial progress of Waki dam & Bham Dam under AIBP is given in the table No: 6

**Table 5: PHYSICAL PROGRAMME & PROGRESS OF AIBP WORKS (Upto Oct, 2014)**

r. No.	Project component under AIBP	Unit	Total Estimated Quantity (As per project report submitted at the time of MoU)	Quantity Executed before project included under AIBP	Balance Quantity of Project (Col.4-Col.5)	Quantity of Project Components proposed under AIBP (As per MoU)	Updated quantity under AIBP (3/2014)	Quantity Executed under AIBP up to March end of previous year i.e. 3/14	Target in the current year 2014-15	Achv. till 10/2014	commulative achievement till 10/2014
1	2	3	4	5	6	7	8	9	10	11	12
	<b>HEAD WORK</b>										
<b>A)</b>	<b>WAKI DAM</b>										
1	Land Acquisition	Ha	1093.36	522.05	571.31	571.31	571.31	543.99	27.32	0	543.99
2	Earthwork										
	Excavation	Tcum	375.805	325.37	50.44	50.44	74.39	65.23	9.16	0.00	65.23
	Embankment	Tcum	1174.974	496.81	678.169	678.169	730.71	553.57	177.14	168.75	722.32
3	Concrete	Tcum	9.849	0.00	9.849	9.849	21.72	17.83	3.89	0	17.83
4	Masonry	Tcum	32.287	24.543	7.744	7.744	13.277	9.25	4.03	0	9.25
5	Gates	MT	395.63	0.00	395.63	395.63	395.63	385.63	10.00	0	385.63
6	Miscellaneous	Job	Job	Job	Job	Job	Job	Job	Job	Job	Job
<b>B)</b>	<b>BHAM DAM</b>										
1	Land Acquisition	Ha	517.81	14.40	503.41	503.41	503.41	388.11	115.30	0	388.11
2	Earthwork										
	Excavation	Tcum	450.18	0.00	450.18	450.18	586.65	244.73	341.92	104.56	349.29
	Embankment	Tcum	4002.30	0.00	4002.30	4002.30	4361.12	2122.36	1343.26	412.56	2534.92
4	Concrete	Tcum	7.41	0.00	7.41	7.41	326.36	19.85	91.95	14.69	34.54
3	Masonry	Tcum	84.93	0.00	84.93	84.93	0.00	0.00	0.00	0.00	0.00
5	Gates	MT	101.36	0.00	101.36	101.36	259.90	0.00	51.98	0.00	0.00
6	Miscellaneous	Job	Job	Job	Job	Job	Job	Job	Job	Job	Job

**Table 6: Financial Program and Progress (Upto Oct 2014)****(Amount in Crore)**

S. No.	Project components under AIBP	Total Estimated Cost (As per project report submitted at the time of MoU)	Expenditure before project included under AIBP	Balance cost of the Project (Col.3 - Col.4)	Cost of Project Components Proposed under AIBP (As per MoU)	Updated cost under AIBP 3/2014	Expenditure under AIBP upto March end of previous year i.e. 3/14	Target in the year current year (Tentative)	Exp till Oct 2014	Cumulative Exp till Dec 2013
1	2	3	4	5	6	7	8	9	12	13
	<b>HEAD WORK</b>									
<b>A)</b>	<b>WAKI DAM</b>									
1	Land Acquisition	45.23	18.59	26.64	26.64	79.20	36.46	42.74	6.93	43.39
2	Earth work									
	Excavation	3.80	3.23	0.57	0.57	1.03	0.96	0.07	0	0.96
	Embankment	13.77	5.93	7.84	7.84	25.97	16.62	9.35	0.09	16.70
3	Concrete	5.32	0.00	5.32	5.32	14.23	12.68	1.55	0	12.68
4	Masonry	6.45	5.79	0.66	0.66	2.10	2.08	0.02	0	2.08
5	Gates	8.05	0.00	8.05	8.05	16.76	9.52	7.24	0	9.52
6	Miscellaneous	7.85	2.22	5.63	5.63	8.47	6.69	1.78	0	6.69
	<b>Sub Total</b>	<b>90.47</b>	<b>35.76</b>	<b>54.71</b>	<b>54.71</b>	<b>147.76</b>	<b>85.01</b>	<b>62.75</b>	<b>7.01</b>	<b>92.03</b>
<b>B)</b>	<b>BHAM DAM</b>									
	<b>HEAD WORK</b>									
1	Land Acquisition	54.02	14.54	39.48	39.48	116.64	49.54	41.44	1.22	50.76
2	Earth work									
	Excavation	8.58	0.00	8.58	8.58	7.36	4.79	2.57	0	4.79
	Embankment	59.26	0.00	59.26	59.26	86.03	36.21	34.35	2.10	38.31
3	Concrete	5.38	0.00	5.38	5.38	200.10	15.19	55.47	2.72	17.91
4	Masonry	19.30	0.00	19.30	19.30	0.00	0.00	0.00	0.69	0.69
5	Gates	1.36	0.00	1.36	1.36	5.22	0.46	0.95	0	0.46
6	Miscellaneous	7.62	0.28	7.34	7.34	18.30	0.81	6.94	0	0.81
	<b>Sub Total</b>	<b>155.52</b>	<b>14.82</b>	<b>140.70</b>	<b>140.70</b>	<b>433.65</b>	<b>107.00</b>	<b>141.72</b>	<b>6.73</b>	<b>113.73</b>
	<b>Grand Total</b>	<b>245.99</b>	<b>50.58</b>	<b>195.41</b>	<b>195.41</b>	<b>581.41</b>	<b>192.01</b>	<b>204.47</b>	<b>13.75</b>	<b>205.76</b>

## 12. MONITORING OF PROJECT AT STATE LEVEL

In compliance to Water Resources Department, Government of Maharashtra, Government Resolution No MoN-2008/(181/2008)/ PLN-3, Mantralaya Mumbai dated: 06.10.2008, the following monitoring cell is established for monitoring the ongoing Major & Medium Project under GMIDC.

Table-7: State level Monitoring cell, GoM

Sr. No.	Name of Executive Engineer / Dy Engineer / Sect. Engineer.	Designation
1.	Shri. R.S. Patil	Executive Engineer
2.	Shri. R.P.Bhat	Sub Divisional Officer
3.	Mrs. S. A. Shahane	Asst. Engineer Grade I
4.	Shri. M.S.Pandey	Asst. Engineer Grade II

As per ref. Govt. Resolution, the work of Monitoring Cell established under Corporation is as under

- A) To collect Quarterly monitoring report of ongoing all Major & Medium project under corporation.
- B) Scrutinize the Quarterly monitoring report.
- C) Monitoring Cell should report to Executive Director ,directly

## 13. COMPLIANCE OF ISSUES/ACTION POINTS CONTAINED IN PREVIOUS 7<sup>th</sup> STATUS REPORT

Compliance report to CWC observations contained in 6th Status Report issued in November 2014 is enclosed at **Annexure-III**.

## 14. CADWM

The total cost of CADWM is Rs 153.33 cores and was cleared by GOI on dated: 18.02.2010. The MoU is signed between the MoWR, GoI & GoM, for the completion of NMC CAD project in 6 years, for Rs 135.24 Crore, of CCA 49864 Ha. It may be noted that the information on CADWM has been collected after the visit. Upto March 2014, the work of field channel is completed on the area 22175 Ha. & expenditure incurred on this work is Rs. 35.59 Crore. This information was received from the Nandur Madhameshwar Canal Division, Vaijapur.

Table-8: The year-wise physical and financial progress is given in the table below

Sr. No	Year	CCA in Ha / Rs. Crore			
		As per MoU		As per execution	
		Physical	Financial	Physical	Financial
1	Before CADWM	-	-	3000	-
2	2010-11	4000	7.53	3900	9.81
3	2011-12	10000	25.96	4298	6.77
4	2012-13	10000	25.96	4940	8.38
5	2013-14	10000	26.22	4705	8.00
<b>Total</b>		<b>34000</b>	<b>85.67</b>	<b>17843</b>	<b>32.96</b>
6	2014-15 (Upto Dec-2014)	10000	26.8	4332	2.63
7	2015-16	5864	22.77	-	-
	<b>Grand Total</b>	<b>49864</b>	<b>135.24</b>	<b>20843</b>	<b>32.96</b>

## 15. Points needing Attention

### (a) Constraints affecting progress of work

#### i. Technical Inputs – No such constraint

#### ii. Land acquisition & R&R- The land acquisition status of Waki is satisfactory. However, for Bham dam 185.11 Ha out of 503.41 Ha is still to be acquired. The land acquisition esp. for Bham dam needs to be expedited.

There are no serious R&R issues needing attention for Waki dam but for Bham dam due to opposition of PAPs the progress of RR work could not achieved. The project authorities informed that all the RR works are now handed over to the additional sub-division to speed up the RR works. All the three villages namely Bharvaj, Nirpan and three Wadies (Saruktewadi, Borwadi and Darewadi) of Kaluste are yet to be rehabilitated due to displacement from Bham Dam. The issues related to R&R need to be addressed on top priority and requisite progress achieved in time bound manner.

#### iii. Floating of tenders – No critical issue has come to the notice

#### iv. Procurement of scarce material - No critical issue has come to the notice

#### v. Sufficiency of infrastructures including establishment, labour/machinery etc – No critical issue has come to the notice

#### vi. Finance – The cost of revised estimate of Nandur Madhameshwar Project for Rs. 1482.08 Crore (PL 2013-14) is finalized by the Central Water Commission, New Delhi vide letter No. Maha /74/2007-PAC/836-37, dated 08.08.2014. It has been informed by the authorities during the visit that the project was kept for approval in the 124<sup>th</sup> Advisory Committee of Ministry of Water Resources, Govt. of India on dated 16.10.2014 but could not be taken up for discussion in

absence of concurrence from the State finance department of Govt of Maharashtra. The State clearance needs to be actively pursued.

**(b) Time Extension Proposal**

It is be pointed out that the Project Authorities have informed during the discussion that the State Government has submitted a proposal of time extension by two years i.e upto March-2015 to the Planning Commission, New Delhi for approval vide letter 06/032013, which may not be feasible taking into consideration the fact that the proposal is not yet cleared by the TAC of MoWR.

The Project authorities to look into this matter and expedite the proposal by active persuasion including appropriate extension of time limit.

**Monitoring of Project by Independent Agency**

As per the recent direction of Ministry of Water Resources, the projects under AIBP need to be evaluated concurrently by independent agencies. The template for the same is attached at **Annexure-V**. The same need to be carried out.

**CADWM**

The progress in CADWM is lagging with respect to the target. The target expenditure is also very less compared to the provision in the MoU. This issue should be taken up on top priority as per recent guidelines for pari-pasu completion of CADWM works. Yearly physical & financial planning and its implementation need to be ensured by the project authorities.