

ILR in Parliament

Budget session of Parliament was held from 31.01.2023 to 06.04.2023 with a recess from 14.02.2023 to 12.03.2023. Here, the ILR issues raised and were discussed in both the houses of Parliament and projected on the Parliament of India website (Lok Sabha and Rajya Sabha) are incorporated for information to our readers/stakeholders.

A. Lok Sabha

1.1 The details of the inter-linking of rivers in the country, State-wise; the details of the ongoing schemes and schemes proposed for various States in this regard; the funds sanctioned and utilised during the current financial year for the said purpose; and the position or view of the Government on the viability and success of inter-linking of rivers?

The NWDA has been entrusted with the work of interlinking of rivers under National Perspective Plan (NPP). NPP has two components, viz., Himalayan Rivers Development Component and Peninsular Rivers Development Component. 30 link projects have been identified under NPP. Pre-Feasibility Reports (PFRs) of all the 30 links have been completed and Feasibility Reports (FRs) of 24 links and Detailed Project Reports (DPRs) of 8 links have been completed. Ken-Betwa Link Project (KBLP) is the first link project under NPP, for which implementation has been initiated. Latest status and State-wise details of Inter-linking of Rivers (ILR) projects are given at **Annexure I**.

A budget allocation of ₹1,100 crore in the current financial year has been made for KBLP by Government of India. The total amount spent on the project till 31.12.2022 is ₹7,665 crore, including ₹5,038.28 crore from the Central grant and ₹2,626.70 crore from the State budget.

The cooperation of States is paramount in the implementation of inter-linking of rivers projects. Inter-Basin Water Transfer (IBWT) from surplus basins to water deficit basins/areas is essential to address the imbalance in water availability across the country and water security in the country. ILR programme is being pursued in a consultative manner by building consensus amongst the Party States for the implementation of the ILR projects. Government of India has accorded priority to the ILR programme and has been making all efforts to expedite the same.

KBLP is the first inter-linking project taken for implementation as a result of efforts made by Ministry of Jal Shakti and cooperation of States of Madhya Pradesh and Uttar Pradesh. The project is being implemented by Centre and both the States jointly through a Special Purpose Vehicle (KBLPA) with major funding coming from Central Government.

Annexure-I

Latest Status and State-wise Details of Inter-Linking of River (ILR) projects under the National Perspective Plan (NPP)

Peninsular Component

Sl. No.	Name of the link	Status	States benefited	Annual Irrigation (Lakh ha)	Domestic & Industrial (Mm3)	Hydro-power (MW)
1.	Mahanadi (Manibhadra) - Godavari (Dowlaiswaram) link	FR completed	Andhra Pradesh (AP) & Odisha	4.43	700	450
	Alternate Mahanadi (Barmul)- Rushikulya - Godavari (Dowlaiswaram) link	FR completed	AP & Odisha	6.25 (0.91+3.52+1.82**)	700(MGL)% +125**	210 (MGL)% +240**
2.	Godavari (Polavaram) - Krishna(Vijayawada) link	FR completed	AP	2.1	162	--
3.	a.) Godavari (Inchampalli) - Krishna(Nagarjunasagar) link	FR completed	Telangana	2.87	237	975+ 70= 1,045
	b.) Alternate Godavari(Inchampalli)- Krishna (Nagarjunasagar) link*	DPR completed	Telangana	3.67	140	60
4.	Godavari(Inchampalli)- Krishna(Pulichintala) link	FR completed	Telangana & AP	6.13 (1.09+5.04)	413	27
5.	a.) Krishna (Nagarjunasagar) - Pennar(Somasila) link	FR completed	AP	5.81	124	90
	b.) Alternate Krishna (Nagarjunasagar) - Pennar(Somasila) link *	DPR completed	AP	2.94	218	90
6.	Krishna(Srisailem)- Pennar link	FR completed	--	--	--	17
7.	Krishna (Almati)- Pennar link	FR completed	AP & Karnataka	2.58 (1.9+0.68)	56	13.5
8.	a.) Pennar (Somasila) - Cauvery (Grand Anicut) link	FR completed	AP, TamilNadu & Puducherry	4.91 (0.49+4.36+0.06)	1105	--
	b.) Alternate Pennar(Somasila) - Cauvery(Grand Anicut) link*	DPR completed	AP, TamilNadu & Puducherry	2.83 (0.51+2.32)	1098(62+1036)	
9.	Cauvery(Kattalai)- Vaigai-Gundarlink	DPR completed	TamilNadu	4.48	218	--
10.	Parbati-Kalisindh-Chambal link	FR completed	MP & Rajasthan	@Alt.I =2.30 Alt.II =2.20	- 13.2	--
	Parbati - Kuno - Sindh link. \$	PFR completed	MP & Rajasthan			
	Integration of modified	PFR	MP &			

Sl. No.	Name of the link	Status	States benefited	Annual Irrigation (Lakh ha)	Domestic & Industrial (Mm3)	Hydro-power (MW)
	Parbati – Kalisindh-Chambal link with Eastern Rajasthan Canal Project(ERCP)	completed	Rajasthan			
11.	Damanganga - Pinjal link (As per DPR)	DPR completed	Maharashtra (only water supply to Mumbai)	--	895	5
12.	Par-Tapi-Narmada link (As per DPR)	DPR completed	Gujarat & Maharashtra	2.36 (2.32+0.04)	76 (for 27.5 lakh population of Dang, Navsari, Valsad and Nadiad districts)	21
13.	Ken-Betwa link	DPR completed & implementation initiated	UP & MP	10.62 (2.51+8.11)	194	103 (Hydro) & 27 MW (Solar)
14.	Pamba-Achankovil-Vaippar link	FR completed	Tamil Nadu & Kerala	0.91 ---	--	--- 508
15.	Bedti-Varda link	DPR completed	Karnataka	0.60	----	----
16.	Netravati-Hemavati link***	PFR completed	Karnataka	0.34	--	--

%MGL: Mahanadi Godavari Link

** Benefit from six projects of Govt. of Odisha.

@ Alt I-Linking with Gandhisagar Dam; Alt. II-Linking with Rana Pratapsagar Dam

* Alternate study to divert unutilized waters of Godavari river carried out and DPR of Godavari (Inchampalli/ Janampet) – Krishna (Nagarjunasagar) - Pennar (Somasila) – Cauvery (Grand Anicut) link projects completed. Godavari-Cauvery (Grand Anicut) link project has been prepared comprising Godavari (Inchampalli/Janampet)-Krishna (Nagarjunasagar), Krishna (Nagarjunasagar)- Pennar (Somasila) and Pennar (Somasila)- Cauvery(Grand Anicut)link projects.

*** Further studies are not taken up since after implementation of Yettinahole project by Govt. of Karnataka, no surplus water is available in Netravati basin for diversion through this link.

\$ Integration of Eastern Rajasthan Canal Project of Rajasthan and Parbati-Kalisindh-Chambal link

Himalayan Component

Sl. No.	Name of the Link	Status	Country/St atesbenefit ed	Annual Irrigation (Lakh ha)	M&I(Mm ³)	Hydrop ower (MW)
1.	Kosi-Mechi link	PFR completed	Bihar & Nepal	4.74 (2.99+1.75)	24	3,180
2.	Kosi-Ghaghra link	Draft FR completed	Bihar, UP & Nepal	10.58 (8.17+0.67+1.74)	48	--
3.	Gandak-Gangalink	FR Completed (Indian portion)	UP & Nepal	34.58 (28.80+5.78)	700	4,375 (Dam PH) & 180 (Canal PH)
4.	Ghaghra-Yamuna link	FR Completed (Indian portion)	UP & Nepal	26.65 (25.30+1.35)	1391	10,884
5.	Sarda-Yamuna link	FR completed	UP & Uttarakhand	2.95 (2.65+0.30)	3054	3,600
6.	Yamuna-Rajasthan link	FR completed	Haryana & Rajasthan	2.51 (0.11+2.40)	30	--
7.	Rajasthan-Sabarmati link	FR completed	Rajasthan & Gujarat	11.53 (11.21+0.32)	102	--
8.	Chunar-Sone Barrage link	Draft FR completed	Bihar & UP	0.67 (0.30+0.37)	--	--
9.	Sone Dam -Southern Tributaries of Ganga link	PFR completed	Bihar & Jharkhand	3.07 (2.99+0.08)	360	95 (90 Dam PH) & 5 (Canal PH)
10.	Manas-Sankosh-Tista-Ganga (M-S-T-G) link	FR completed	Assam, West Bengal (WB) & Bihar	3.41 (2.05+1.00+0.36)	--	--
11.	Jogighopa-Tista-Farakkalink (Alternative to M-S-T-G)	PFR completed	Assam, WB & Bihar	3.559 (0.975+1.564+1.02)	265	360
12.	Farakka-Sundarbans link	FR completed	WB	1.50	184	--
13.	Ganga (Farakka)-Damodar-Subarnarekha link	FR completed	WB, Odisha & Jharkhand	12.30 (11.18+0.39+0.73)	432	--
14.	Subarnarekha-Mahanadi link	FR completed	WB & Odisha	1.63 (0.18+1.45)	198	9

1.2 The status of the ongoing inter-linking of the river projects across the country; the expected schedule of the completion of the inter-linking of river projects, project-wise; whether the Government has any proposal to include more rivers under this project; and if so, the details thereof?

The NPP for development of water resources was formulated by Government of India in 1980. 30 link projects (16 under Peninsular Component & 14 under Himalayan Component) have been identified under NPP. NWDA has been entrusted with the work of inter-linking of rivers under NPP. Details and current status of the proposals for inter-State linking of rivers under the ILR programme are furnished at **Annexure II.**

The Government is pursuing the ILR program by building consensus amongst the Party States. An ILR project would reach the implementation stage once agreement amongst Party States is reached on water sharing and all requisite statutory clearances for its implementation are obtained. The KBLP is the first link project implementation of which has begun under NPP. The Memorandum of Agreement (MoA) amongst the Government of India and Governments of Madhya Pradesh and Uttar Pradesh for the joint implementation of the project was signed on 22.03.2021. Subsequently, Government of India approved the implementation of KBLP in December, 2021 with an estimated cost of Rs 44,605 crore (year 2020-21 price level) with central support of Rs 39,317 crore through a Special Purpose Vehicle viz; KBLPA. The project is planned to be completed in period of 8 years. However, in case of other ILR projects, it would be difficult to assign a time line for their completion, as it is dependent upon the Party States to reach a consensus on water sharing and other issues.

Recently, looking at the scarce water availability in the State of Rajasthan, the SCILR in its 20th meeting held in December, 2022 in New Delhi has approved the proposal of integration of the ERCP with the Parbati-Kalisindh-Chambal link (a link under NPP) and the Modified PKC, duly integrated with ERCP, to be a part of NPP of interlinking of rivers in the country. The project envisages mitigating the water needs, particularly the drinking water needs, in 13 districts of Rajasthan and 7 districts of MP.

Annexure-II

Details and status of the proposals for Inter-Linking of Rivers under the Inter Linking of Rivers Programme

Sl. No.	Name	Rivers	States concerned	Status
Peninsular Component				
1. (a)	Mahanadi (Manibhadra)-Godavari (Dowlaiswaram) link	Mahanadi and Godavari	Jharkhand, MP, Chhattisgarh, Telangana, Andhra Pradesh, Odisha, Karnataka and Maharashtra	FR Completed.
1. (b)	Mahanadi (Bermul)-Godavari (Dowlaiswaram) link	Mahanadi and Godavari	--do--	FR Completed.
2.	Godavari (Inchampalli)-Krishna (Pulichintala) link	Godavari and Krishna	Odisha, MP, Chhattisgarh, Telangana, Andhra Pradesh, Maharashtra and Karnataka	FR Completed.
3.	Godavari (Inchampalli) - Krishna (Nagarjunasagar) link	Godavari and Krishna	--do--	FR Completed. DPR Completed.
4.	Godavari (Polavaram) - Krishna (Vijayawada) link	Godavari and Krishna	--do--	FR Completed.
5.	Krishna(Almatti)-Pennar link	Krishna and Pennar	Telangana, Andhra Pradesh, Maharashtra and Karnataka	FR Completed.
6.	Krishna (Srisailem)-Pennar link	Krishna and Pennar	--do--	FR Completed.
7.	Krishna (Nagarjunasagar)-Pennar (Somasila) link	Krishna and Pennar	--do--	FR Completed. DPR Completed.
8.	Pennar (Somasila)-Cauvery(Grand Anicut) link	Pennar and Cauvery	Andhra Pradesh, Karnataka, Tamil Nadu, Kerala and Puducherry	FR Completed. DPR Completed.
9.	Cauvery (Kattalai)-Vaigai-Gundar link	Cauvery, Vaigai and Gundar	Karnataka, Tamil Nadu, Kerala and Puducherry	DPR Completed.
10.	Ken-Betwa link	Ken and Betwa	UP and MP	DPR Completed. KBLP has been approved. Implementation initiated.
11. (i)	Parbati - Kalisindh -Chambal link	Parbati, Kalisindh and Chambal	MP, UP and Rajasthan requested to be Consulted during consensus building)	FR Completed.
(ii)	Modified Parbati-Kalisindh-Chambal link (duly integrated with ERCP)	Parbati, Kuno, Kalisindh, Chambal, Mej and Banas	MP and Rajasthan	PFR Completed. \$
12.	Par-Tapi-Narmada link	Par, Tapi and Narmada	Maharashtra and Gujarat	DPR Completed.
13.	Damanganga-Pinjal link	Damanganga and Pinjal	--do--	DPR Completed.
14.	Bedti-Varada link	Bedti and Varada	Maharashtra, Andhra Pradesh and Karnataka	DPR Completed.
15.	Netravati-Hemavati link	Netravati and Hemavati	Karnataka, Tamil Nadu and Kerala	PFR Completed.
16.	Pamba - Achankovil - Vaippar link	Pamba, Achankovil and Vaippar	Kerala and Tamil Nadu	FR Completed.
\$ Integration of Eastern Rajasthan Canal Project of Rajasthan and Parbati-Kalisindh-Chambal link.				

Sl. No.	Name	Rivers	States concerned	Status
Himalayan Component				
1.	Manas-Sankosh-Tista-Ganga (M-S-T-G) link	Manas, Sankosh, Tista and Ganga	Bhutan & India (Assam, West Bengal and Bihar)	FR Completed.
2.	Kosi-Ghaghra link	Kosi and Ghaghra	Nepal & India (Bihar and UP)	PFR Completed.
3.	Gandak-Ganga link	Gandak and Ganga	--do--	FR Completed (Indian portion)
4.	Ghaghra-Yamuna link	Ghaghra and Yamuna	--do--	FR Completed (Indian portion)
5.	Sarda-Yamuna link	Sarda and Yamuna	Nepal & India (Bihar, UP, Uttarakhand, Haryana and Rajasthan)	FR Completed (Indian portion)
6.	Yamuna-Rajasthan link	Yamuna and Sukri	Gujarat, Rajasthan, Haryana and Uttar Pradesh	FR Completed.
7.	Rajasthan-Sabarmati link	Sabarmati	--do--	FR Completed.
8.	Chunar- Sone Barrage link	Ganga and Sone	Bihar and UP	Draft FR Completed.
9.	Sone Dam – Southern Tributaries of Ganga link	Sone and Badua	Bihar and Jharkhand	PFR Completed.
10.	Ganga (Farakka)- Damodar-Subernarekha link	Ganga, Damodar and Subernarekha	West Bengal, Odisha and Jharkhand	FR Completed.
11.	Subernarekha-Mahanadi link	Subernarekha and Mahanadi	West Bengal and Odisha	FR Completed.
12.	Kosi-Mechi Link	Kosi and Mechi	Nepal & India (Bihar and West Bengal)	PFR Completed.
13.	Ganga (Farakka)- Sunderbans link	Ganga and Ichhamati	West Bengal	FR Completed.
14.	Jogighopa-Tista-Farakka link (Alternative to M-S-T-G)	Manas, Tista and Ganga	Assam, Bihar and West Bengal	Dropped.

- PFR- Pre Feasibility Report
- FR- Feasibility Report
- DPR- Detailed Project Report

1.3 Whether the Government proposes to interlink the rivers and revive the said project; if so, the details thereof; whether the Government has conducted any survey to assess the benefits of the said project for most of the States like Rajasthan, Madhya Pradesh etc.; and if so, the details thereof ?

The NWDA has been entrusted with the work of interlinking of rivers under the NPP. The NPP has two components, viz., Himalayan Rivers Development Component and Peninsular Rivers Development Component. 30 link projects have been identified under the NPP. PFRs of all the 30 links have been completed, while FRs of 24 links and DPRs of 8 links have been completed. KBLP is the first link project under the NPP, for which implementation has been initiated. Latest status and State-wise details of ILR projects are given at **Annexure-I** (which is attached in Question No-1.1)

Under the ILR programme, study of the link projects includes preparing water balance reports, preparation of PFRs, carrying out survey and investigation of the project areas and preparation of FRs and DPRs, etc. In case of States of Rajasthan and Madhya Pradesh also, detailed survey and investigation for ILR projects have been conducted during preparation of their FRs and DPRs.

Three link projects under the NPP, viz; Yamuna-Rajasthan link, Rajasthan-Sabarmati link and Modified Parbati-Kalisindh-Chambal link are to benefit the State of Rajasthan. Two link projects under the NPP, viz; Ken-Betwa link and Modified Parbati-Kalisindh-Chambal link will benefit the State of Madhya Pradesh. As per the surveys and studies done by NWDA, the irrigation benefits and present status of these links benefitting the States of Rajasthan and Madhya Pradesh are, inter alia, contained in the **Annexure I** (which is attached in Question No-1.1).

1.4 Whether any proposals for interlinking of rivers in Haryana, Rajasthan, Madhya Pradesh, Punjab, Maharashtra and Uttar Pradesh are pending with the Government; if so, the details thereof along with the reasons for such pendency; the progress of the works carried out for interlinking of the rivers and dams in the said States so far; whether any obstacles are being faced in the completion of the said project; and if so, the details thereof ?

NWDA has identified 30 links (16 under Peninsular Rivers Development Component and 14 under Himalayan Rivers Development Component) under the NPP. Out of 30 identified link projects under the NPP, PFRs of all the 30 links have been completed, while FRs of 24 links and Detailed Project Reports of 8 links have been completed. The Government of India approved the implementation of the KBLP in December, 2021 in the States of Madhya Pradesh and Uttar Pradesh, with an estimated cost of ₹ 44,605 crore (year 2020-21 price level) with a Central Support of ₹ 39,317 crore through a Special Purpose Vehicle, viz; KBLPA. KBLP is the first ILR project under the NPP, for which implementation has been initiated. Latest status of ILR projects, State-wise, inter alia, including the States of Haryana, Rajasthan, Madhya Pradesh, Maharashtra and Uttar Pradesh are given at **Annexure II** (which is attached in Question No-1.2).

This important ILR programme is being pursued in a consultative manner through building consensus amongst the party States for the implementation of projects. However, reaching a consensus amongst the party States on issues related to water sharing, etc remains very crucial and challenging for implementation of the ILR projects. The implementation of the ILR link projects, however, depends upon the concerned States to reach a consensus.

1.5 The salient features of the ambitious interlinking of river project; the details of the steps taken/proposed to be taken in this regard so far; the current status of the said ambitious project; whether the said project is a boon for most of the districts of North India which are in the grip of drought; and if so, the details of the steps being taken/proposed to be taken by the Government to start the said project at the earliest ?

The NPP for Water Resources Development was formulated by the Government of India in 1980. The NPP comprises of two components, viz; Peninsular Rivers Development Component and Himalayan Rivers Development Component. Salient features of the two components are given at **Annexure-III**

Under the two components of NPP, a total of 30 link projects have been identified; 14 link projects under Himalayan Rivers Development Component and 16 link projects under Peninsular Rivers Development Component. NWDA has been entrusted with the work of Interlinking of Rivers under the NPP. Out of 30 identified link projects under the NPP, PFRs of all the 30 links have been completed, while FRs of 24 links and DPRs of 8 links have also been completed.

The KBLP is the first link under the NPP for which implementation has been initiated. The Government of India approved the implementation of the project in December, 2021 with an estimated cost of ₹ 44,605 crore (year 2020-21 price level) with a Central Support of ₹ 39,317 crore through a Special Purpose Vehicle, viz; KBLPA. The current status of Inter-linking of river projects is given at **Annexure-II** (which is attached in Question No-1.2).

Under the NPP, link projects cover many districts of North India which are in the grip of drought. The KBLP will benefit the Bundelkhand region of MP and UP, which faces recurrent drought situation. The project will provide annual irrigation to an area of 10.62 lakh hectare (8.11 lakh hectare in MP and 2.51 lakh hectare in UP) in the Chhattarpur, Tikamgarh, Panna, Sagar, Damoh and Datia districts of MP and Banda, Mahoba, Jhansi and Lalitpur districts of Uttar Pradesh in Bundelkhand region as well as to the Vidisha, Shivpuri and Raisen districts of Madhya Pradesh. The project will also provide 194 Million Cubic Metre (MCM) of water for enroute drinking water supply to a population of 62 lakh (41 lakh in MP and 21 lakh in UP) and generate 130 MW of power (103 MW of hydro power and 27 MW of solar power).

The Government has made vigorous efforts by pursuing the ILR program in a consultative manner and has accorded it top priority. DPRs of link projects, upon completion, have been shared with the concerned States and efforts made at various levels for the States to reach a consensus. A "Special Committee on Interlinking of Rivers (SCILR)" has been constituted in September, 2014 for the implementation of ILR programme. The implementation of the ILR link projects depends upon the concerned States to reach a consensus on related issues.

Annexure-III

Features of Inter-Linking of Rivers

Peninsular Rivers Development Component: The scheme is divided into four major parts:

- i. Interlinking of Mahanadi-Godavari-Krishna-Pennar-Cauvery rivers and building storages at potential sites in these basins. This part involves interlinking of the major river systems where surplus from the Mahanadi and the Godavari are intended to be transferred to the needy areas in the south, through Krishna, Pennar and Cauvery rivers.
- ii. Interlinking of west flowing rivers, north of Bombay and south of Tapi: The scheme provides for taking water supply canal to the metropolitan areas of Mumbai; it also provides irrigation in the coastal areas in Maharashtra.
- iii. Interlinking of Ken-Chambal: The scheme provides for a water grid for Madhya Pradesh, Rajasthan and Uttar Pradesh and interlinking canal backed by as many storages as possible.
- iv. Diversion of other west flowing rivers : The high rainfall on the western side of the "Western Ghats" runs down into numerous streams which discharge into the Arabian Sea. The construction of an interlinking canal system backed up by adequate storages could be planned to meet requirements of new areas on the western side as also for transfer of some waters towards east to meet the needs of drought affected areas.

Himalayan Rivers Development Component: The Himalayan Rivers Development Component envisages construction of storages on the principal tributaries of Ganga and the Brahmaputra in India, Nepal and Bhutan along with interlinking canal systems to transfer surplus flows of the eastern tributaries of the Ganga to the West, apart from linking of the main Brahmaputra and its tributaries with the Ganga and Ganga with Mahanadi and further south.

1.6 Whether the Government in concurrence with the NWDA has decided to come up with the plan to link Godavari-Krishna-Penna-Cauvery rivers; if so, the details thereof; if not, the reasons therefor; whether the lack of consensus in this respect is causing delays in the said projects; if so, the details thereof; and the details of the measures taken/proposed to be taken by the Government to resolve the same?

Government of India formulated a National Perspective Plan in 1980 and NWDA has been entrusted with the work of ILR under the NPP. Godavari - Krishna - Pennar - Cauvery link project is among the 30 link projects identified under the NPP. As envisaged under the NPP, Godavari is to be augmented by transfer of surplus waters from Mahanadi and Brahmaputra basins, for further diversion of waters to Krishna, Pennar and Cauvery basins.

The Government of India is making concerted efforts in consultation with the party States, for the implementation of this link project. Pending consensus on Mahanadi-Godavari and Godavari (Inchampalli)-Krishna link projects, alternative studies to divert surplus waters available in Godavari basin and unutilized waters in Indravati sub-basin of Godavari basin through Godavari - Cauvery link project were carried out by the NWDA. The Godavari (Inchampalli)-Cauvery (Grand Anicut) link comprises three links, viz; Godavari (Inchampalli) - Krishna (Nagarjunasagar) link, Krishna (Nagarjunasagar) – Pennar (Somasila) link and Pennar (Somasila)-Cauvery (Grand Anicut) link. This link project traverses through Godavari, Krishna, Pennar, Palar and Cauvery basins and lies in the States of Telangana, Andhra Pradesh and Tamil Nadu. The link project has been identified as one of the priority link projects. The DPR of the Godavari (Inchampalli)-Cauvery (Grand Anicut) link project was completed by NWDA in consultation with the party States. The link project is envisaged for diversion of 7,000 MCM of water annually from Godavari basin to Krishna, Pennar and Cauvery basins for providing annual irrigation of 9.44 lakh hectares. Does not arise.

Regarding the Godavari (Inchampalli)-Cauvery (Grand Anicut) link project, the party States have raised concerns related to surplus waters availability in Godavari basin and quantum of allocation of waters to the States. The issue have been deliberated in the consultation meetings with party States and also in the meetings of NWDA Society and SCILR held on 13.12.2022.

Based on decisions taken during the consultation meeting held on 18.02.2022, an alternative study has been carried out by NWDA to recast the proposal limiting the transfer from 7,000 MCM to about 4,000 MCM from Godavari (unutilized water in Indravati sub-basin) along with combining the proposal for supplementation in Krishna basin through Bedti-Varda link. Technical Feasibility Report (TFR) of this proposal has been completed and circulated to the party States in January, 2023. The concerns raised by the party States on the link project have also been deliberated with the party States in the meeting of Task Force for Interlinking of Rivers held on 06.03.2023. The implementation of the ILR link projects depends upon the party States to reach a consensus.

Rajya Sabha

- 1.1 Whether Government has changed the money sharing pattern between Central Government and States Governments in linking of rivers project; if so, details thereof and reasons therefor; whether the proposed Godavari-Penna-Krishna-Kaveri Inter Linking of Rivers Project would get only 60 per cent from Government and 40 per cent has to be shared by all States; if so, reasons therefor; and whether in case of escalation in the project cost, Central Government would share only 20 per cent of the 'additional cost' and the remaining, 40 per cent of 'additional cost' has to be borne by concerned State Government?**

NWDA has identified 30 links (16 under Peninsular Component and 14 under Himalayan Component) under NPP of Govt. of India. Out of 30 identified link projects under NPP, PFRs of all the 30 links have been completed and FRs of 24 links and DPRs of 8 links have been completed.

No such decision about the change of fund sharing pattern between Central Government and States Governments in case Inter linking of rivers projects have been taken. The issue related to the sharing of the project cost and funding pattern etc. arises at time of implementation of the link projects.

1.2 The status of Eastern Rajasthan Canal Project (ERCP) in Rajasthan; whether the State Government of Rajasthan has taken necessary steps to declare ERCP as a national project, if so, the details thereof; whether any initiative has been taken to enter into an Inter-State water agreement with Government of Madhya Pradesh for the said scheme, if so, the details thereof; whether the State Government of Rajasthan has placed any proposal to include major dams of Dausa, Alwar, Sawai Madhopur, Karauli under ERCP, if so, the details thereof; and whether Government proposes to suo-moto declare ERCP as a national project?

The DPR of ERCP with an estimated cost of Rs. 37,247.12 crore (at 2014 price level) was submitted by the Government of Rajasthan in November, 2017 for techno-economic appraisal. As per the prevailing norms, the projects on Inter-State rivers are required to be planned for 75% dependable yield. Appraisal of the project could not be completed as the project is planned on 50% dependable yield, which is not acceptable as per prevailing norms and also to Government of MP, which is a co-basin State. This position has been informed to Government of Rajasthan. So far, revised DPR based on 75% dependable yield has not been submitted by the Government of Rajasthan. As per the extant guidelines, techno-economic appraisal and subsequent Investment Clearance is a pre-requisite criteria for inclusion of a project as a National Project.

With a view to optimize the utilization of water of the Chambal River System, the Task force on Interlinking of Rivers (TFILR) in November, 2019 decided to explore the integration of the ERCP with Parbati- Kalisindh-Chambal (PKC) Link Canal Project, which is one of the 30 link projects identified under NPP prepared by Ministry of Jal Shakti in 1980. Accordingly, NWDA prepared a draft PFR for Parbati-Kuno-Sindh link project pertaining to the components in MP and proposing to integrate the same with ERCP to make it an Inter-State interlinking project benefiting both MP and Rajasthan.

The issue of integration of ERCP with PKC link has been deliberated with both the States at various platforms, with a view to bring them to a consensus with regard to particularly the issue related to the dependability criteria. Based on these deliberations, a proposal of the modified PKC link, incorporating the components as proposed by Government of MP in Kuno, Parbati and Kalisindh sub-basins along with components of ERCP corresponding to divertible water available at 75 percent

dependability, has been framed. Phase-I of the Modified PKC link project has subsequently been identified as one of the priority link projects, as approved by the SCILR in its 20th meeting held in December, 2022. Efforts have been made by the Government of India to build consensus among the States of MP and Rajasthan, on issues related to the project.

As per the DPR received from Government of Rajasthan in November, 2017, which has been prepared based on planning on 50% dependable yield; 10 new barrages/dams (including additional storage creation in existing and ongoing dams) were proposed under ERCP. Out of these, Rathod Barrage and Doongri Dam were proposed in Sawai Madhopur district. Further, 25 existing en-route tanks/dams were also part of the overall ERCP scheme. Out of these, Morel dam is in Dausa district, Jaisamand tank in Alwar district, Mui tank, Panchola dam, Surwal dam and Dheel dam in Sawai Madhopur district, while Kalisil dam, Panchna dam and Jugger dam are in Karauli district.

1.3 The details of the proposal for linking of Inter-State rivers in Madhya Pradesh under the interlinking of rivers programme?

The NPP for development of water resources was formulated by Government of India in 1980. 30 link projects have been identified under the NPP. The NPP has two components viz; Himalayan Rivers Development Component (14 link projects) and Peninsular Rivers Development Component (16 link projects).

Under the NPP, there are 2 ILR projects benefitting the State of Madhya Pradesh, the details of which are as under:

1. KBLP is a multi-purpose project with irrigation, hydro-power and water supply benefits. The project will provide annual irrigation to an area of 10.62 lakh ha (8.11 lakh ha in MP and 2.51 lakh ha in UP) in the Chhattarpur, Tikamgarh, Panna, Sagar, Damoh and Datia districts of MP and Banda, Mahoba, Jhansi and Lalitpur districts of UP in Bundelkhand region as well as to the Vidisha, Shivpuri and Raisen districts of MP. The project envisages, inter alia, to provide 194 MCM of water for *en route* drinking water supply to a population of 62 lakh (41 lakh in MP and 21 lakh in UP) and also to generate 103 MW of hydro-power and 27 MW of solar power.

The Government of India approved the project for implementation in December, 2021 at an estimated cost of Rs. 44,605 crore (2020-21 price level) with central support of Rs 39,317 crore. Gazette notification was issued in February 2022 constituting a Steering Committee and a Special Purpose Vehicle, viz; KBLPA for the implementation of KBLP jointly by the Government of India and the State Governments of MP and UP. Three meetings of the Steering Committee of Ken-Betwa Link Project (SC-KBLP) have been held; the third meeting was held on 18.01.2023. Two meetings of the KBLPA have also been held, the second meeting was held on 13.09.2022. Initially, the focus is on land acquisition, R&R, fulfilling the compliances to the conditions of forest clearance and wildlife clearance.

2. PKC link project, as planned originally under NPP, could not materialise due to lack of consensus on water sharing between MP and Rajasthan. In the meanwhile, Government of Rajasthan also formulated ERCP to utilize surplus water resources available in the catchments of some of the sub-basins of Chambal basin viz. Kalisindh and Parbati sub-basins, to meet water demands, particularly for the drinking water supply in 13 districts of eastern Rajasthan. Accordingly, a proposal of Modified PKC (integration of ERCP with PKC link) link has been framed to utilise the water in entire Chambal basin optimally. The Modified PKC link incorporates the components as proposed by Government of MP in Kuno, Parbati and Kalisindh sub-basins along with the components of ERCP corresponding to divertible water available at 75 percent dependability.

1.4 The number of River linking projects in the State of Gujarat and the status of each of these projects?

NPP for development of water resources was formulated by Government of India in 1980. 30 link projects have been identified under NPP which envisages two components, viz., Himalayan Rivers Development Component (14 link projects) and Peninsular Rivers Development Component (16 link projects).

Three links viz; Par-Tapi-Narmada (PTN) link, Damanganga-Pinjal (DP) link and Rajasthan-Sabarmati (RS) link projects have been identified under the NPP with regard to the State of Gujarat.

DPRs of the PTN link project and DP link project (under the Peninsular Rivers component) were circulated to concerned States of Maharashtra and Gujarat.

FR of Rajasthan-Sabarmati link (under the Himalayan Rivers component) has been completed. However, availability of water to this link is dependent on water brought through links passing/originating in Nepal.

Also, the NWDA had received a proposal of Intra-State link project, viz., Damanganga - Sabarmati - Chorwad Intra-State link, from the Government of Gujarat. PFR of the link project was prepared by NWDA and was sent to Government of Gujarat.

1.5 The current status of Ken-Betwa link project; by when this project is targeted to be completed; and the benefits Bundelkhand region of Uttar Pradesh is likely to get after the completion of this project, the details thereof?

The current status of KBLP is placed at **Annexure IV**. This project is targeted for completion by March, 2030.

KBLP will provide annual irrigation to an area of 2.51 lakh hectares in Banda, Mahoba, Jhansi and Lalitpur districts of Bundelkhand region in Uttar Pradesh, apart from providing water for *en route* drinking water supply to a population of 21 lakh.

In addition to these benefits, the project will rejuvenate all the tanks situated *en route* area of link canal by feeding them through the canal, wherever possible and would help in ground water recharge. The project would also help boost the socioeconomic prosperity of the Bundelkhand region, which presently faces recurrent drought situation.

Annexure-IV

Status of Ken-Betwa Link Project

- i. With allocation of budget under RE of FY 2021-22, the implementation of the project has started.
- ii. The Gazette Notification for the constitution of the Steering Committee under the chairmanship of Secretary, DoWR, RD & GR for KBLP and a Special Purpose Vehicle, KBLPA, for implementation of KBLP has been issued by DoWR, RD & GR, Ministry of Jal Shakti on 11.2.2022.
- iii. As decided during the first meeting of Steering Committee, held on 7th April, 2022, the offices of KBLPA have been opened at Bhopal, Jhansi and Chattarpur. MoU has been signed with WAPCOS (I) Ltd for renovation and furnishing of offices of KBLPA.
- iv. Initially the focus is on land acquisition, Rehabilitation & Resettlement, fulfilling the compliances to the conditions of forest clearance and wildlife clearance. An integrated Landscape Management Plan of Panna Tiger Reserve has been prepared by Wildlife Institute of India to increase its carrying capacity.
- v. Three meetings of the SC-KBLP have been held under the Chairmanship of Secretary DoWR, RD & GR, Ministry of Jal Shakti in New Delhi. The third meeting was held on 18.01.2023.
- vi. Two meetings of the KBLPA have been held. The Second Meeting was held on 13.09.2022 at Bhopal.

1.6 The progress made in the process of interlinking of rivers in the country during the last five years; whether Government proposes to link mountainous rivers flowing down from Nepal to Bihar with any other river in the State; if so, the details thereof; whether Government has signed or considered signing any agreement with the State Governments for undertaking the task of interlinking of rivers; and if so, the details thereof and the estimated expenditure on this project along with estimated time to be taken in the interlinking of rivers ?

The Government of India formulated a NPP for ILR in 1980. NWDA has been entrusted with the work of Interlinking of Rivers under the NPP. The NPP has two components, viz; Himalayan Rivers Development Component and Peninsular Rivers Development Component. 30 link projects have been identified under the NPP. In last 5 years, significant progress has been made in the ILR programme, details of which are given at **Annexure-V**.

Under the Himalayan Rivers Development Component of the NPP, 3 link projects, viz; Kosi-Mechi Link project, Kosi-Ghaghra link project and Chunar-Sone

Barrage link project envisage transfer of water from Kosi, Ghaghra and Gandak rivers flowing down from Nepal to the other rivers in the State of Bihar.

The PFR for Kosi-Mechi Inter State link project has been completed by NWDA. This link project lies in Nepal. As per the PFR, the link would provide for annual irrigation of 4.74 lakh ha (2.99 lakh ha in Bihar) and 24 MCM of domestic and industrial water supply in Bihar and Nepal.

The Kosi-Ghaghra link project, draft FR for which has been completed, envisages diversion of 7482 MCM of water from right bank of the river Kosi from proposed Chatra barrage to the Ghaghra in order to extend irrigation to un-irrigated areas of Bihar and UP, north of river Ganga in the basins of Kosi, Kamla, Balan, Bagmati, Burhi Gandak, Gandak and Ghaghra rivers. The link would provide for annual irrigation to 10.58 lakh ha area (8.17 Lakh ha in Bihar) and 48 MCM of domestic & industrial water supply in Bihar, UP and Nepal.

The Chunar-Sone Barrage link project, draft FR for which has been completed, envisages transfer of water from river Ganga at Chunar to Sone river. River Ganga at Chunar would be surplus through augmentation of 6879 MCM of water from the proposed Gandak-Ganga link project and 4090 MCM from the proposed Ghaghra-Yamuna link project. Out of this surplus, Ganga water available at Chunar for diversion to Sone river would be 5918 MCM. The link project would provide for enroute annual irrigation of 0.67 lakh ha area, out of which 0.13 lakh ha lies in Bihar. The link canal would take over the existing commands of Western Sone Low Level Canal and High Level Canal to the extent of 4364.49 MCM of water and also the existing requirement of Sone barrage to the extent of 928.47 MCM of water directly. Due to this arrangement, additional 2.99 lakh ha irrigation will also be provided to Bihar through Sone Dam - Southern Tributaries of Ganga link, PFR of which has been completed.

Apart from the above, the DPR for Kosi-Mechi Intra-State link project was prepared by NWDA in March, 2014. This Intra-State link project has been accorded Environmental Clearance and Investment Clearance in 2019 and 2020 respectively. A Memorandum of Understanding for the preparation of working DPR for this Intra-State link project has been signed between NWDA and Government of Bihar in December, 2022.

The Government has pursued the ILR program in a consultative manner and has accorded it top priority. DPRs of the ILR projects after completion, are sent to the party States and efforts made at various levels to bring them to a consensus on the issues related to water sharing etc., so as to take these link projects ahead to the implementation stage.

The KBLP is the first ILR project under the NPP, implementation of which has been initiated. The MoA for the implementation of the KBLP amongst the party States and the Government of India was signed on 22.03.2021. Subsequently, the link

project was approved by the Government of India in December, 2021 for implementation at an estimated cost of Rs 44,605 crore (year 2020-21 price level) with a central support of Rs 39,317 crore and through a Special Purpose Vehicle (SPV), viz; KBLPA. The total expenditure made on KBLP (Phase I and Phase II) till date is Rs. 7998.42 Crore. This link project is planned to be completed by March, 2030.

Expenditure and estimated time period for completion for the other ILR projects would be considered when they reach the stage of implementation. The implementation of the ILR projects, however, depends upon the party States to reach a consensus.

Annexure-V

Details of Significant Progress Made in Inter-Linking of Rivers (ILR) Programme in Last 5 Years

- i. The PFR of 1 link project, FRs of 9 link projects and DPRs of 7 link projects have been completed.
- ii. The Ken-Betwa link project is the first link project under NPP, for which implementation has been initiated in the year 2022, after getting approval from the Govt. of India in December, 2021. Techno economic clearance and most of the statutory clearances have been obtained for the link project.
- iii. Draft MoU for implementation of Par-Tapi-Narmada link and Damanganga-Pinjal link projects was prepared and sent to the Governments of Maharashtra and Gujarat in September, 2017.
- iv. DPR for Godavari-Cauvery link project (comprising of three link projects) was completed by NWDA and sent to the concerned States in April, 2021. An alternative study for Godavari-Cauvery link project as per decision taken during consultation meeting held in February, 2022 with the party States has been completed by NWDA and a TFR for the same has been submitted to the party States in January, 2023.
- v. In the meeting of the Special Committee on Inter Linking of Rivers held on 13.12.2022, the proposal for making the Phase-I of Modified Parbati-Kalisindh-Chambal link duly integrated with the Eastern Rajasthan Canal Project as part of the NPP and declaring this project as one of the priority link projects has been approved. Draft PFR and Draft MoU for the proposal have been completed and sent to the concerned States in January, 2023.
- vi. System studies for Mahanadi-Godavari link project has also been completed.

1.7 The details of environmental resettlement and rehabilitation problems occurring in the implementation of Interlinking of River (ILR) projects including action taken thereon; whether there are certain difficulties/impediments that Government has not been able to address in the implementation of ILR projects; and if so, the details thereof along with the strategy chalked out in this regard?

Interlinking of Rivers (ILR) projects are water transfer projects and like other water resources projects, these link projects also entail issues related to impact of such projects on physical, biological and socio-economic environment, submergence of areas, displacement of people and their resettlement and rehabilitation. For dealing with such issues, a detailed Environmental Impact Assessment (EIA) study for the link projects under the National Perspective Plan (NPP) is carried out to identify positive and negative impacts of the projects on physical, biological and socio-economic environment during the preparation of Detailed Project Reports (DPRs). The study areas for conducting EIA studies are identified and after completing EIA studies, Environmental Management Plan (EMP) is prepared to suggest the actions to be taken for mitigating the impacts of the project on environment. Impact on air environment, land environment, noise environment, water environment, biological environment, socio-economic environment are studied in details.

Regarding Resettlement and Rehabilitation (R&R) issues of project affected persons / families, proper R&R plans are prepared at DPR stage as per "Right to Fair Compensation and Transparency in Land Acquisition, Rehabilitation and Resettlement Act, 2013".

The consensus building among the party States on the issues related to water sharing, etc. is the most challenging task for implementation of the ILR projects. The Government has accorded top priority to the ILR program and concerted efforts for building consensus amongst the party States have been made.

A "Special Committee on Interlinking of Rivers" has been constituted in September, 2014 for the implementation of ILR programme. 20 meetings of the Special Committee have been held so far. Further, a Task Force for Interlinking of Rivers has been constituted in April, 2015 for expediting the works under the ILR programme and 16 meetings of the Task Force have been held so far. States have wide representation and active participation in these meetings.

Implementation of an ILR project, however, depends upon the party States to reach a consensus.
