

Report on Reprioritisation of Subwatersheds of Panchet Dam (RVP) Catchment (part of 2A2 Catchment) in Damodar River Valley Project, Districts Dhanbad, Giridih and Hazaribag of Jharkhand and Puruliya of West Bengal

Abstract

- 1. Study Area** : Panchet Dam (RVP) Catchment (part of 2A2 Catchment) in Damodar River Valley Project, Districts Dhanbad, Giridih and Hazaribag of Jharkhand and Puruliya of West Bengal
- 2. Location** : 23^o23' – 24^o07' N Latitude
85^o15' – 86^o50' E Longitude
- 3. Total Area** : 5,35,780 ha
- 4. Agricultural Region** : Eastern plateau and Hills (Zone no. 7) as per Planning Commission
- 5. Period of Survey** : November 1996 to March 1997
April 1997 to June 1997
- 6. Type of Survey** : Rapid Reconnaissance
- 7. Base Material** : Survey of India Topographical Map (scale 1 : 50,000)

8. Mapping Units and their Extent

Sl. No.	Erosion Intensity Mapping Unit	Area (ha)	%
1.	A1	5568	1.04
2.	C1	2885	0.54
3.	C2	1981	0.37
4.	C3	469	0.09
5.	C4	1251	0.23
6.	C5	8188	1.53
7.	C6	863	0.16
8.	C7	5882	1.10
9.	C8	27943	5.21
10.	C9	48825	9.11
11.	C10	26252	4.90
12.	C11	6696	1.25
13.	C12	9835	1.84
14.	C13	9229	1.72
15.	C14	8446	1.58
16.	C15	8207	1.53
17.	C16	691	0.13
18.	GN1	14829	2.77
19.	GN2	9790	1.83
20.	GN3	5260	0.98
21.	GN4	2438	0.46
22.	GN5	17121	3.20
23.	GN6	3521	0.66
24.	GN7	13186	2.46
25.	GN8	71380	13.32
26.	GN9	89227	16.65
27.	GN10	23855	4.45
28.	GN11	10130	1.89
29.	GN12	26577	4.96
30.	GN13	691	0.13
31.	GN14	18768	3.50
32.	GN15	22137	4.13
33.	GN16	1110	0.21
34.	Canal	58	0.01
35.	HS	15386	2.86
36.	Nala	84	0.02
37.	Reservoir	315	0.06
38.	River	14833	2.77
39.	Tank	1846	0.34
40.	Water Body	27	0.01
	Total	535780	100.00

9. Priority Categorisation

Sl. No.	Priority Category	SYI Range	Nos. of S/W	Area (ha)	%
1	Very High	1100 and Above	19	47,808	8.92
2	High	1000-1099	64	1,60,879	30.03
3	Medium	900-999	64	1,60,978	30.05
4	Low	800-899	56	1,59,415	29.75
5	Very Low	Below 800	3	6,700	1.25
Total			206	5,35,780	100.00

10. District wise Area under Different Priority Categorisation

Sl. No.	Priority Category	West Bengal	Bihar			Total Area (ha)	%
		Puruliya	Dhanbad	Giridih	Hazaribag		
1.	Very High	958	7059	31524	8267	47808	8.92
2.	High	15173	38215	66469	41022	160879	30.03
3.	Medium	47578	43545	44217	25638	1,60,978	30.05
4.	Low	43488	85056	20522	10349	1,59,415	29.75
5.	Very Low	-	6700	-	-	6,700	1.25
Total		107197	180575	162732	85276	5,35,780	100.00

11. Subcatchment wise Area under Different Priority Categories

Sl. No.	Priority Categories	2A2F (1-5)	2A2G(1-4)	Total Area (ha)	%
		Area (ha)	Area (ha)		
1.	Very high	12279	35529	47808	8.92
2.	High	57105	103774	160879	30.03
3.	Medium	90162	70816	1,60,978	30.05
4.	Low	124083	35332	1,59,415	29.75
5.	Very Low	6700	-	6,700	1.25
Total		290329	245451	5,35,780	100.00

Salient Findings:

- ▣ The survey area comprises 206 subwatersheds out of which 19 subwatersheds categorized under very high and 64 under high.
- ▣ About 30.44% of the survey area suffer from moderate to very severe erosion.
- ▣ Area under medium and low priority categories is indicative of potential zone for intensive agricultural practices.