

Report on Prioritisation of subwatersheds in 4G2 catchment (Part) of Mahanadi basin (Hirakud RVP- catchment), District Raigarh & Raipur of M.P. and Sambalpur of Orissa State.

A B S T R A C T

(Part)

1. Surveyed area : 4G2 catchment/ of Mahanadi basin (Hirakud RVP catchment)
2. Base material : Survey of India  
Topographic maps (1:50,000 scale)
3. Location : 21°-13' to 21°-45' Latitudes and  
82°-56' to 83°-52' Longitudes
4. Total area : 1,99,050 ha
5. Type of survey : Rapid Reconnaissance Survey for  
identification and demarcation of  
priority subwatersheds.
6. Period of survey : April 1995 to June 1995
7. Extent of areas under:  
different erosion intensity  
mapping units

Sr.No.	Mapping units	Area (ha)	Percentage
1.	A1	825	0.41%
2.	A2	4213	2.12%
3.	A3	7100	3.57 %
4.	C1	1085	0.55 %
5.	C2	41433	20.83 %
6.	C3	12552	6.31 %
7.	C4	5265	2.65 %
8.	C5	4029	2.02 %
9.	L1	4525	2.22 %
10.	S1	3089	1.56 %
11.	S2	16461	8.28 %
12.	S3	46238	23.23 %
13.	S4	12388	6.22 %
14.	S5	2240	1.13 %
15.	S6	5595	2.81 %
16.	S7	20575	10.35 %
17.	S8	2710	1.36 %
18.	Dam, habitation, River, Tank rockout crops, etc.	8727	4.38 %
Grand Total		199050	

## 8. Hydrological sub division - 4G2E1a

- 4 - Region
- G - Basin
- 2 - Catchment
- E - Sub catchment
- 1 - Watershed
- a - Subwatershed

## 9. Gradation of Priority subwatersheds :

Sr. No.	Priority category	Silt Yield Index range	No. of subwater sheds	Area in (ha)	Percentage
1.	Very high	1300 and above	16	37465	18.8
2.	High	1200 - 1299	17	53280	26.8
3.	Medium	1100 - 1199	14	36290	18.2
4.	Low	1000 - 1099	9	25455	12.8
5.	Very low	Below 1000	18	46560	23.4
Total			74	199050	100.0

## 9A. Districtwise distribution of area (ha) and number of subwatersheds falling in Madhya Pradesh

Priority category	Area (ha)	Raigarh Dist		Raipur		Total area (ha)	Total sub-water sheds	% Percentage
		No. of subwater sheds	Area (ha)	No. of sub-water sheds	Area (ha)			
Very high	8250	3	1975	1	10225	4	6.9	
High	36305	12	9975	3	46280	15	31.0	
Medium	13625	5	16725	6	30350	11	20.4	
Low	10275	4	9600	3	19875	7	13.3	
Very low	34775	13	7625	3	42400	16	24.4	
Total area/subwater-sheds		103230	37	45900	16	149130	53	100.0

(iii)

9b. Districtwise distribution of area (ha.) and number of subwatersheds falling in Orissa State.

Sr. No.	Priority category	District Sambalpur	No. of subwatersheds	Percent
1.	Very high	27240	12	54.6
2.	High	6600	2	13.2
3.	Medium	6340	3	12.7
4.	Low	5580	2	11.2
5.	Very low	4160	2	8.3
Total area/ subwatersheds		49920	21	100.0