

**REPORT ON PRIORITIZATION OF MICROWATERSHEDS IN 5A2C1 TO 5A2C7 WATERSHEDS OF 5A2C SUBCATCHMENT (NON RVP) IN KOZHIKODE, MALAPPURAM, PALAKKAD, WAYANAD DISTRICTS OF KERALA STATE AND NILGIRIS DISTRICT OF TAMIL NADU STATE**

**ABSTRACT**

1. **Survey area** : 5A2C1 to 5A2C7 watersheds of 5A2C Subcatchment (Non RVP) in Kozhikode, Malappuram, Palakkad and Wayanad Districts of Kerala and Nilgiris District of Tamil Nadu State
2. **Location** : 75° 47' to 76° 34' E longitude  
10° 55' to 11° 37' N latitude
3. **Total area surveyed** : 418,488 ha
4. **No. of microwatersheds** : 287
5. **Agro-climatic region** :
6. **Type of survey** : Rapid Reconnaissance Survey for Priority delineation of Microwatersheds
7. **Period of survey** : April 2008 – June 2008
8. **Base map** : Survey of India topo sheets on 1:50,000 scale
9. **Toposheets** : 49 M/14, 49 M/15, 49 M/16, 49 N/13  
58A/02, 58A/03, 58A/04, 58A/05,  
58A/06, 58A/07, 58A/08, 58A/09,  
58A/10, 58A/11  
58B/01, 58B/05
10. **Hydrological divisions** : a) Region – 5  
b) Basin – 5A  
c) Catchment – 5A2  
d) Subcatchment – 5A2C  
e) Watersheds – 5A2C1 to 5A2C7  
f) Sub watersheds - 5A1C1a, 5A1C1b  
g) Micro-watersheds – 5A2C1a1,  
5A2C1a2.... Etc

## 15. Distribution of area under different erosion classes

| Sl No. | Erosion                    | Area (ha)     | Percentage   |
|--------|----------------------------|---------------|--------------|
| 1      | None to slight erosion     | 76407         | 18.3         |
| 2      | Slight to Moderate erosion | 41981         | 10.0         |
| 3      | Moderate erosion           | 256145        | 61.2         |
| 4      | Moderate to Severe erosion | 26122         | 6.2          |
| 5      | Misc                       | 17833         | 4.3          |
| 6      | <b>Total</b>               | <b>418488</b> | <b>100.0</b> |

## 21. Salient features

- Out of 287 micro-watersheds only 58 falls under very high priority category, 80 falls under high, 98 medium and 48 under low priority category;
- Out of total surveyed area of 418488 ha, 90190 ha (26.55%) falls under very high priority category and 116046 ha (27.73 %) falls under high priority category.
- Moderate erosion hazards are present in 256145 ha (61.2%) and moderate to severe erosion hazard are prevalent over an area of 26122 ha (2.5 %), respectively.
- Hillside slopes (10-50%) occupy maximum area of 225993 (54.0%) ha in the surveyed area.
- Out of four landscapes occurring in the area, granite landscape occupies on nearly 276632 ha (66.1 %) of the total area whereas Alluvial, Costal Alluvial and Laterite landscape occupy 42383(10.1%), 4679(1.1%), 76961(18.4%), ha respectively.
- Majority of the area of 134194 ha (32.1%) area is under dense forest, whereas 56894 ha(13.6%), 142322 ha(34.0%), 57828 ha(13.8%) and only 9417 ha (2.3%) were found under estates, orchards, multiple crops and open scrubs respectively.
- Deep to very deep soils occupy majority of the area spread over 320468 ha (76.6%), whereas the area under very deep soils are spread over 55218 ha (13.2 %) area of the total surveyed area.