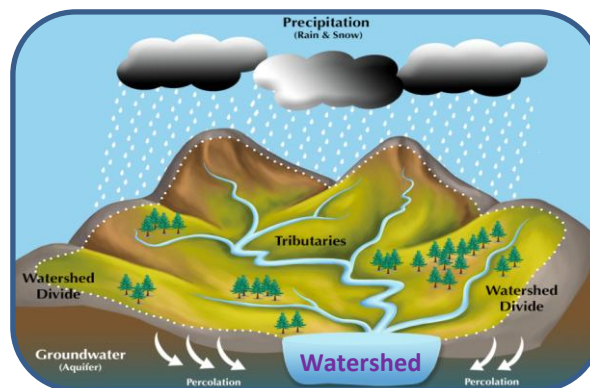


Government of Telangana – Forest Department



SITE SUITABILITY ANALYSIS FOR WATER HARVESTING STRUCTURES USING REMOTE SENSING & GIS

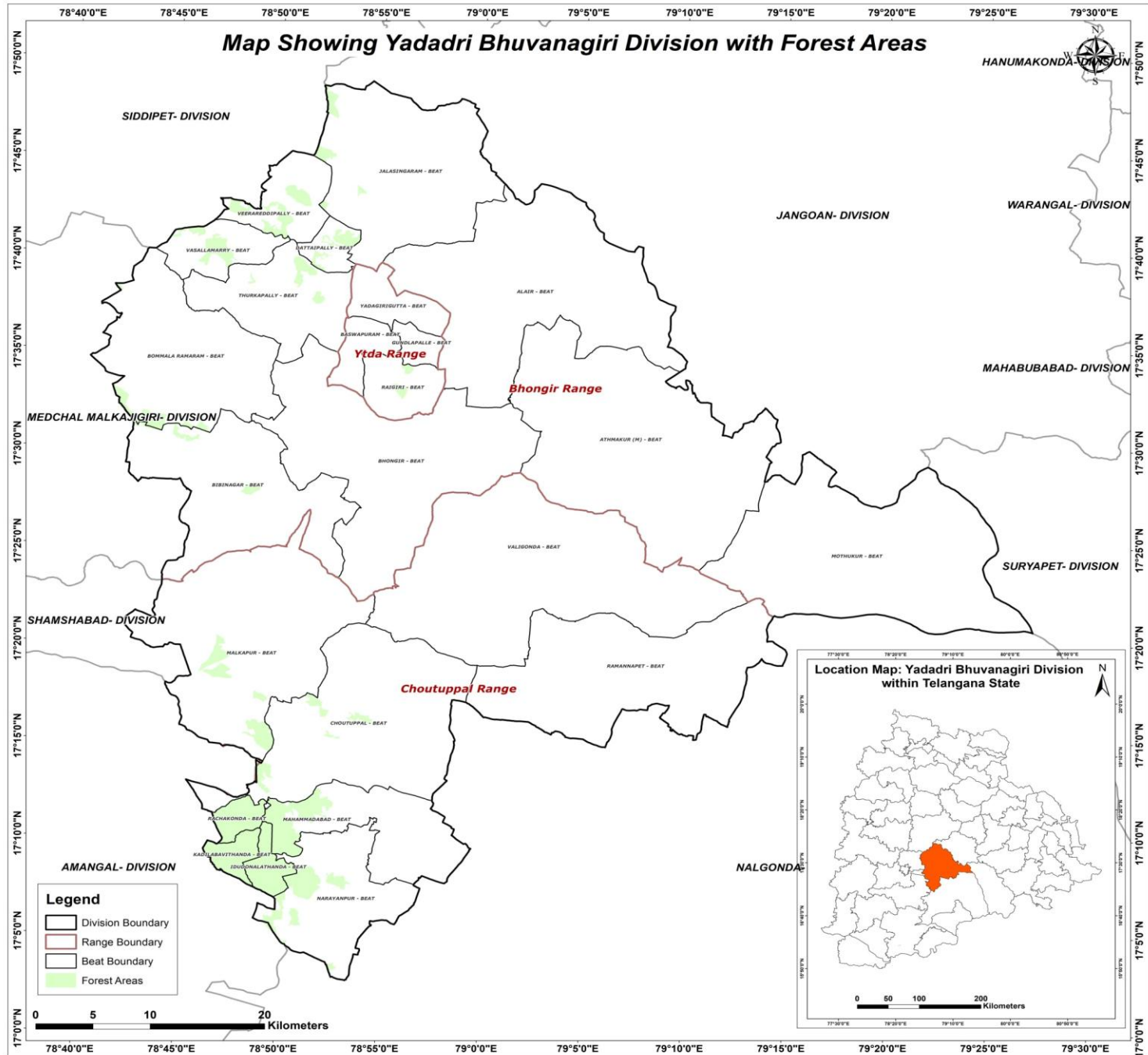


SITE SUITABILITY ANALYSIS FOR WATER HARVESTING STRUCTURES USING REMOTE SENSING & GIS

Circle: Yadadri
District: Yadadri Bhuvanagiri
Division: Yadadri Bhuvanagiri

**Prepared at Geomatics Centre
O/o Prl.Chief Conservator of Forests
Aranya Bhavan, Saifabad
Hyderabad - 500004**

Map Showing Yadadri Bhuvanagiri Division with Forest Areas



METHODOLOGY

Various methods are available to evaluate the suitability of locations for Percolation Tanks and other SMC structures using Arc GIS.

- A common approach is to use Geographic Information System (GIS) tools to decide the suitability by analysing factors like topography, vegetation density, distance to water sources, and terrain slope.
- Data was gathered from various sources, including the Raster Sentinel data obtained from the Copernicus open access hub.
- Elevation values were applied to the raster data using the SNAP software to create a Digital Elevation Model (DEM).
- Using Arc GIS, streams were mapped based on DEM, and potential percolation tank sites were identified based on stream order.
- Slope data generated from the CARTOSAT 30 m DEM (Source: Bhuvan) were also included in the analysis.
- By overlaying these spatial datasets and applying specific criteria, GIS can help identify optimal locations for building percolation tanks.
- Once the best location is identified, the catchment area is determined.
- The location is then ranked on the basis of catchment area and vegetation cover, with rankings ranging from I to V.



FLOW CHART FOR METHODOLOGY



Guidelines for building Percolation Tanks:

- Refer to the Site Suitability Map given by the GIS Cell for suitable locations
- Choose the best location for constructing a percolation tank based on the ranking priority. The priority for treatment of the watershed should be based on stream order, with primary streams taking precedence over secondary streams and secondary streams taking precedence over tertiary streams. This phased approach will ensure effective management of the watershed.
- Field conditions such as local climate, slope, vegetation and soil type must be considered when determining the location. It is important to move either upstream or downstream for a distance of about 50M, depending on the specific conditions of the site.
- It is essential to follow the priority given in the map. If no specific points are indicated, site suitability should be considered a determining factor.
- Encroached areas were not considered when demarcating points for constructing the Percolation tank.
- In the field, where streams are found at the optimal location, a percolation tank can be built if a point is missing on the map.
- The catchment area should also be considered when estimating the construction requirements like length of the bund, height of the bund, wear width etc., after verifying with the actual field conditions.
- Planting native vegetation around the tank can stabilize the soil, prevent erosion, and improve water absorption. Use plants that are well suited to the local environment.



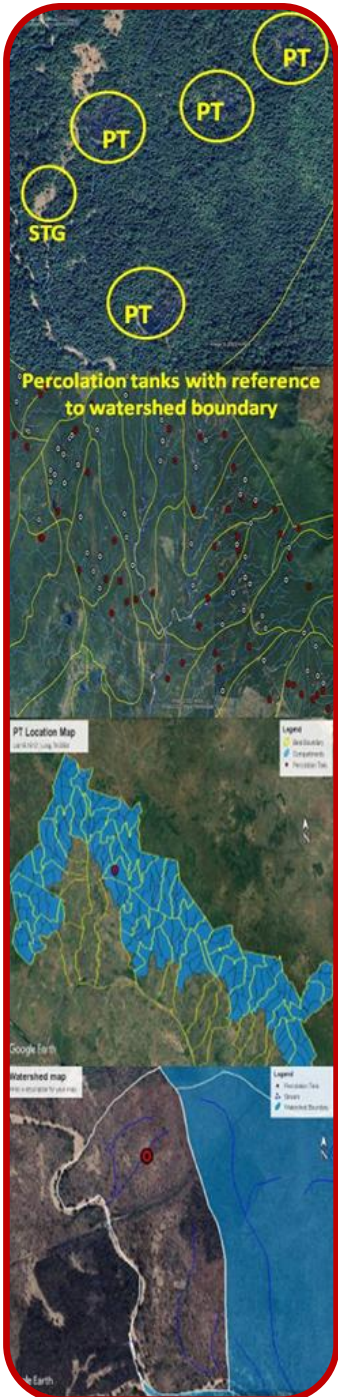
Suitability criteria for Check-Dams and Percolation Tanks (SITE SUITABILITY INDEX)

Index	Slope(Degrees)	Density Class
Highly suitable	0-5	Blank & Scrub
Moderately suitable	0-5	Open Forest
Least suitable	0-5	Dense Forest

Suitability criteria for Continuous/Staggered contour trenches

Rank	Slope classes (Degrees)	Density Classes
Highly Suitable	>5 and <= 10	Blanks
Moderately Suitable	>5 and <= 10	Scrub forest
Least suitable	>5 and <= 10	Open forest
	> 10 and < 25	Blanks & scrubs
MPTs and SGPs	>5 and <= 10	Dense Forest
	> 10 and < 25	Open and Dense forest





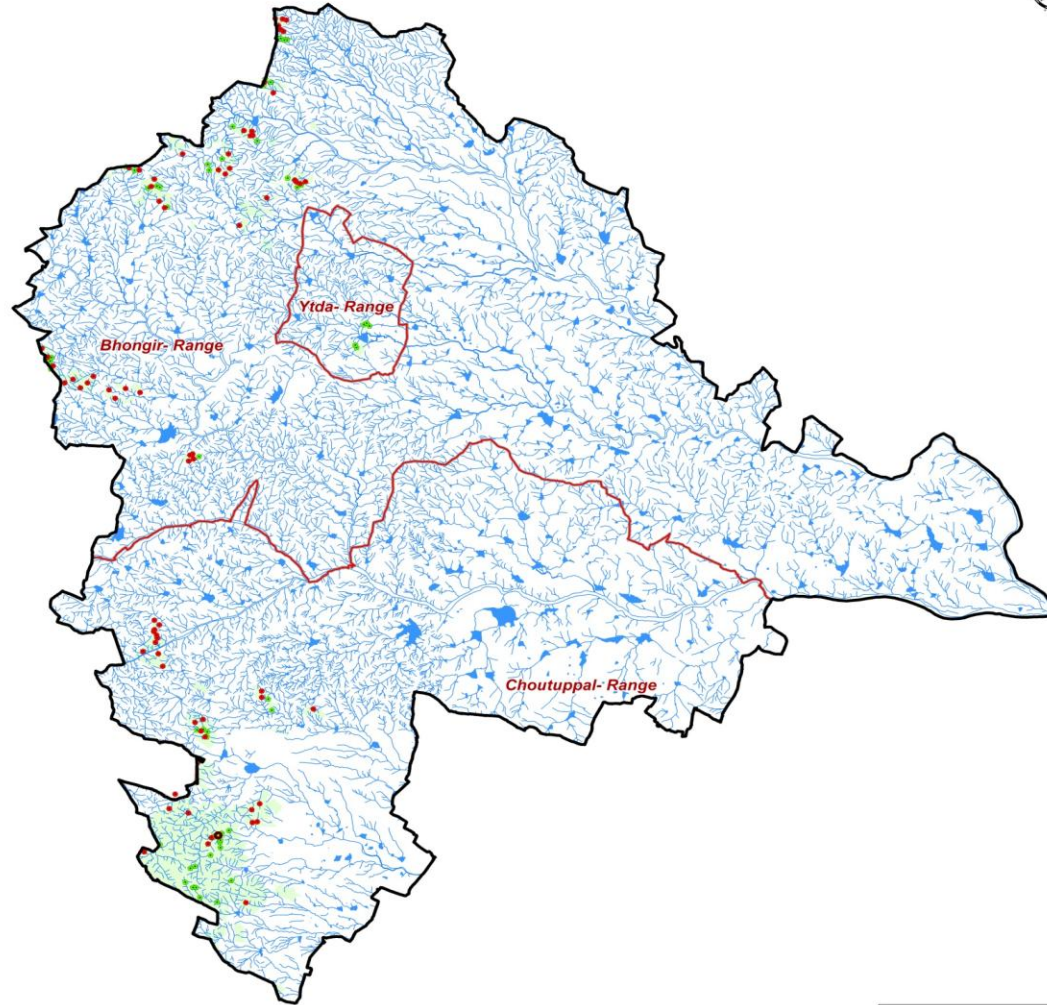
PRIORITY CLASSES FOR PERCOLATION TANK

Priority	Catchment Area(Ha)	Density Class
1	0-25 0-25	Scrub Blank
2	0-25 25-50	Open Forest Blank
3	25-50 >50	Open Forest Scrub & blank
4	0-25 >50	Dense Forest Open Forest
5	25-50 >50	Dense Forest Dense Forest



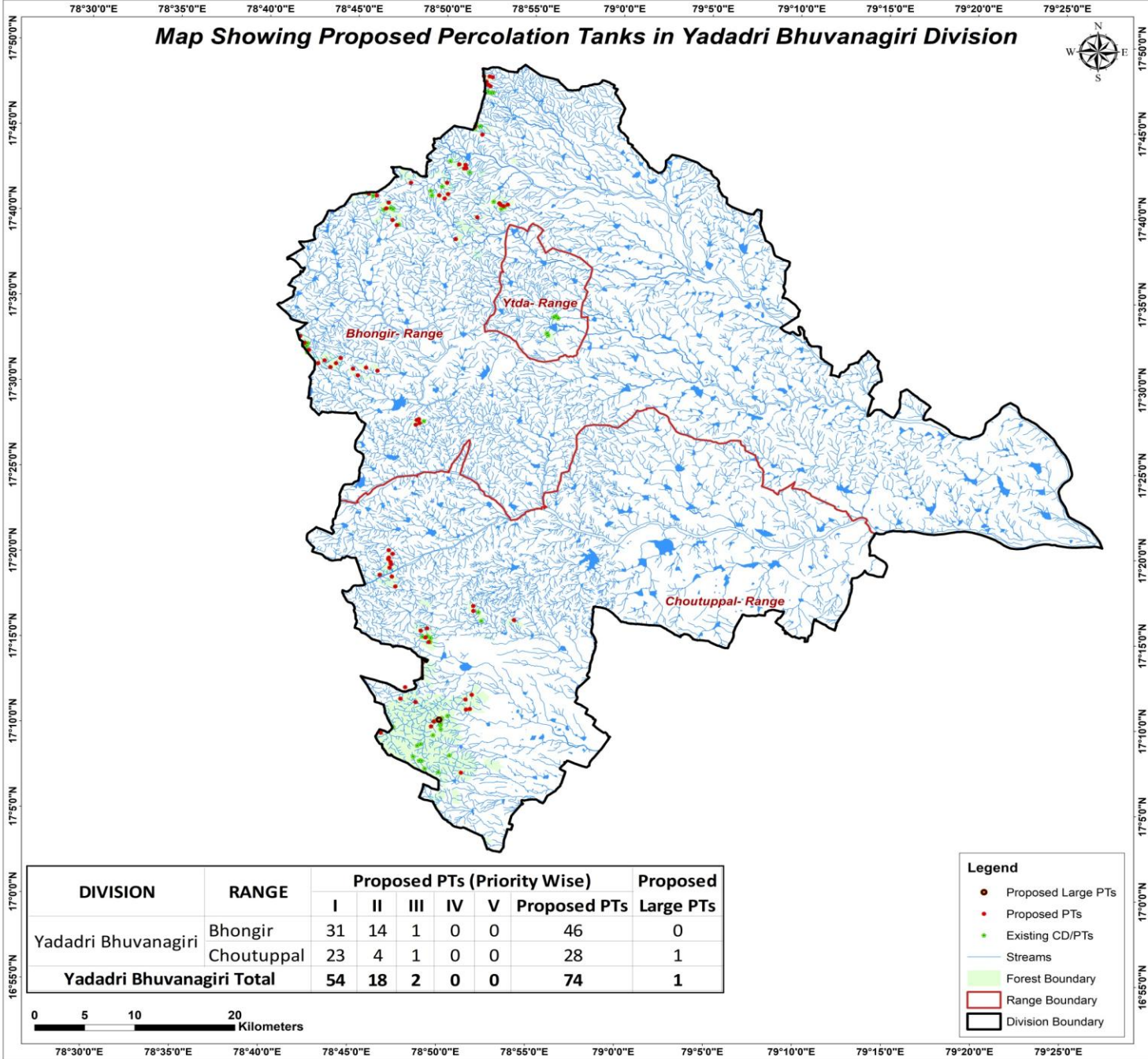


Map Showing Proposed Percolation Tanks in Yadadri Bhuvanagiri Division

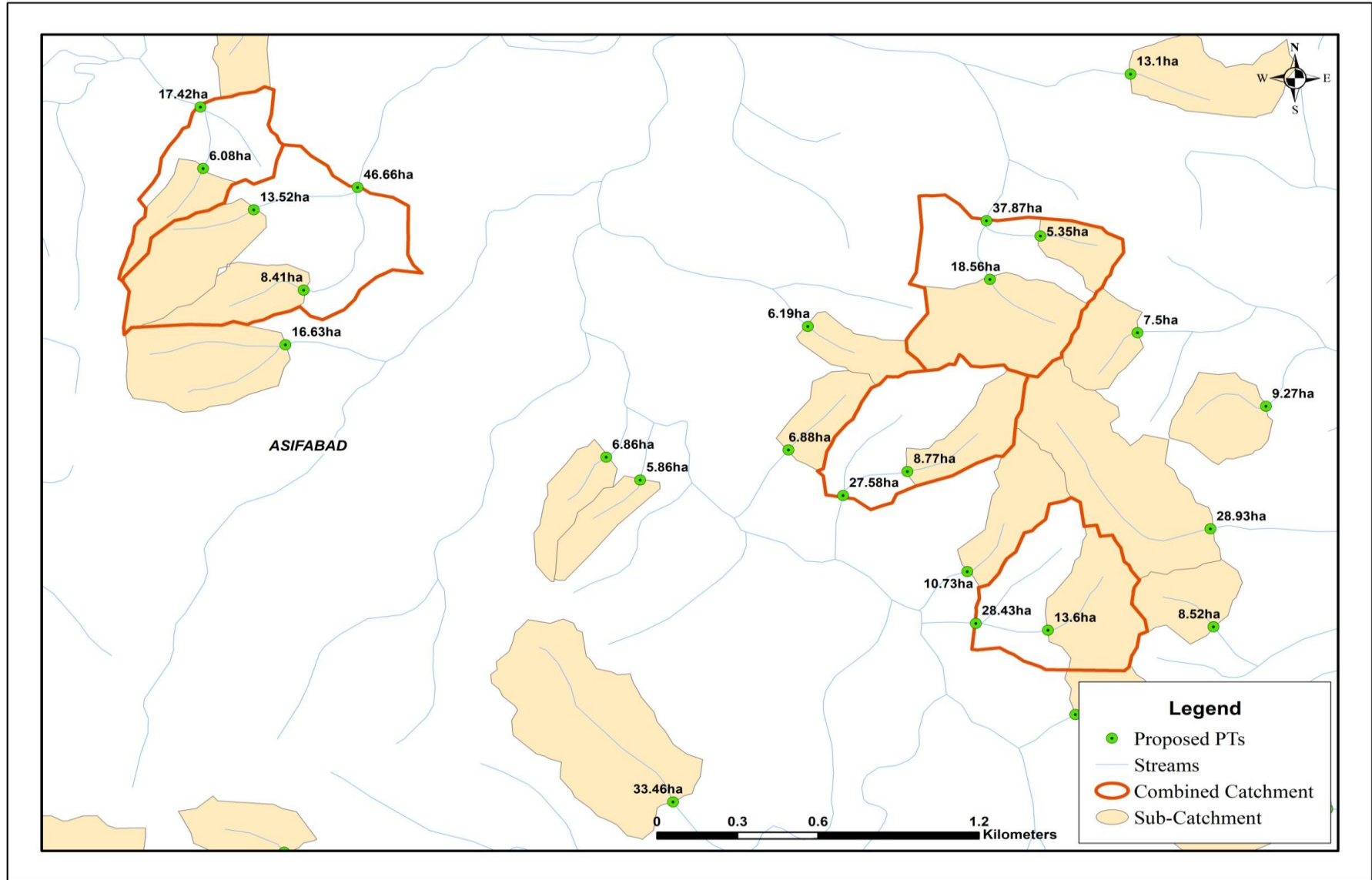


DIVISION	RANGE	Proposed PTs (Priority Wise)					Proposed PTs	Proposed Large PTs
		I	II	III	IV	V		
Yadadri Bhuvanagiri	Bhongir	31	14	1	0	0	46	0
	Choutuppal	23	4	1	0	0	28	1
Yadadri Bhuvanagiri Total		54	18	2	0	0	74	1

- Legend**
- Proposed Large PTs
 - Proposed PTs
 - Existing CD/PTs
 - Streams
 - Forest Boundary
 - Range Boundary
 - Division Boundary



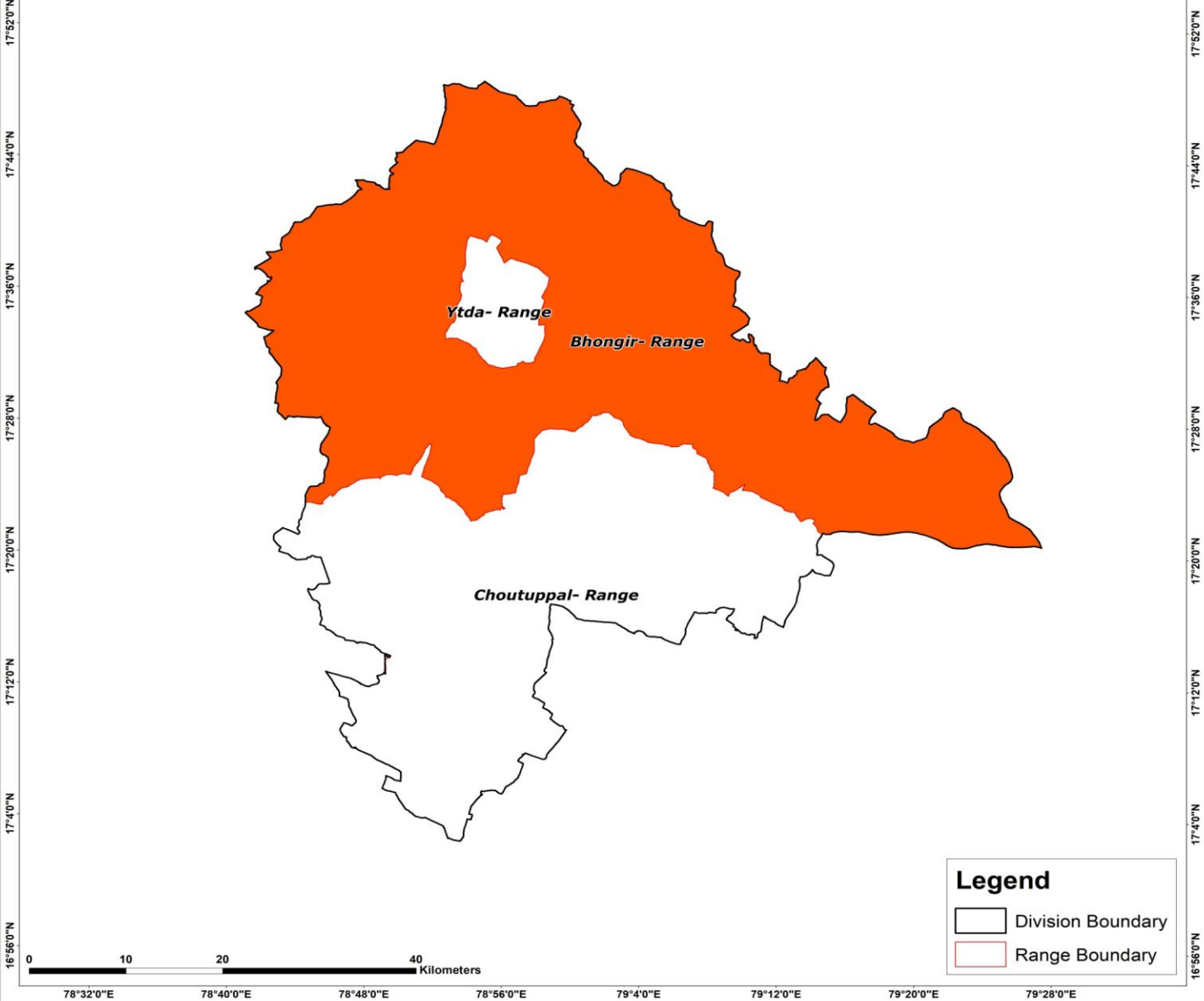
CATCHMENT AREA



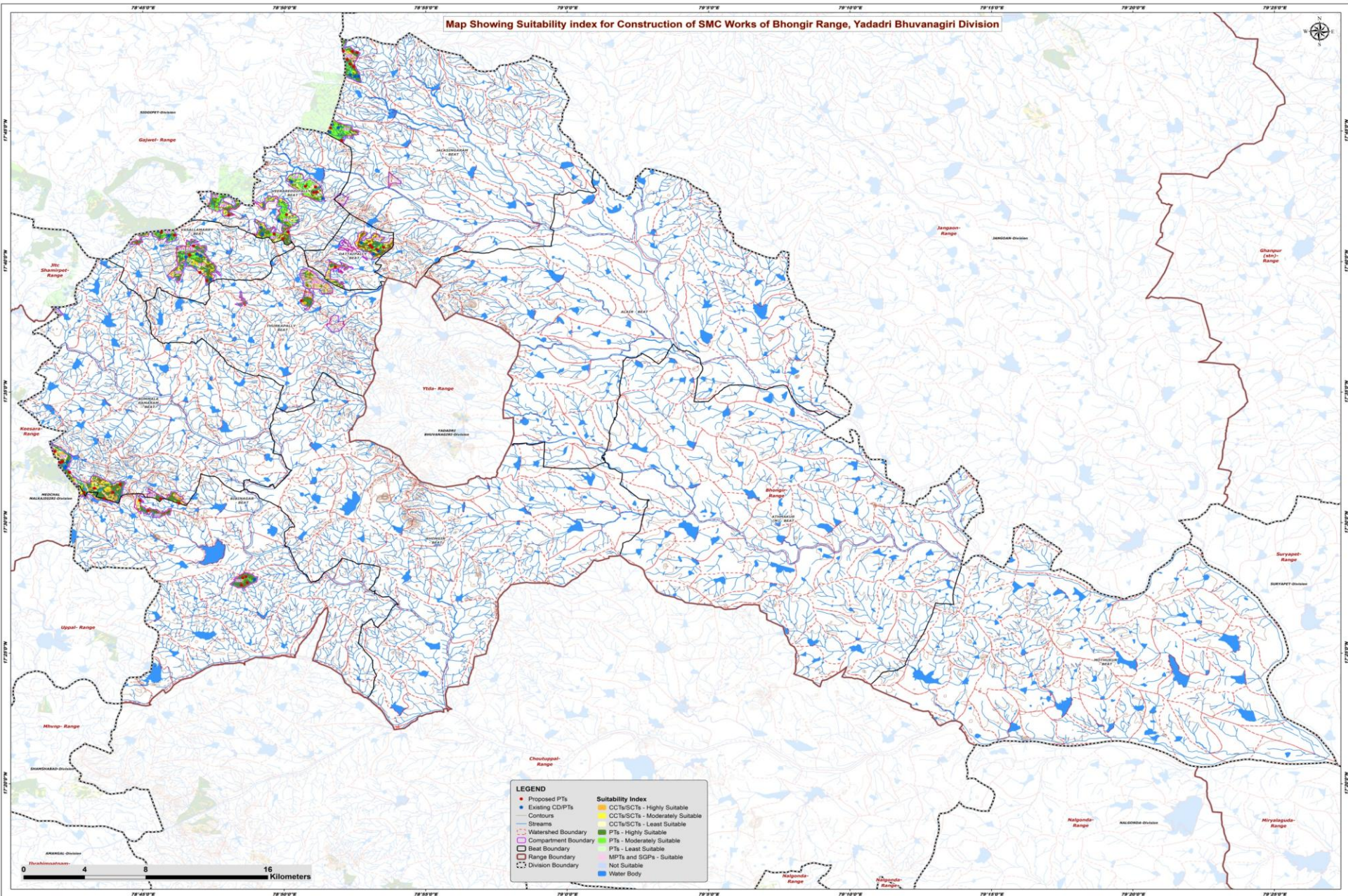
Sample Catchment Map



Map Showing Bhongir Range in Yadadri Bhuvanagiri Division

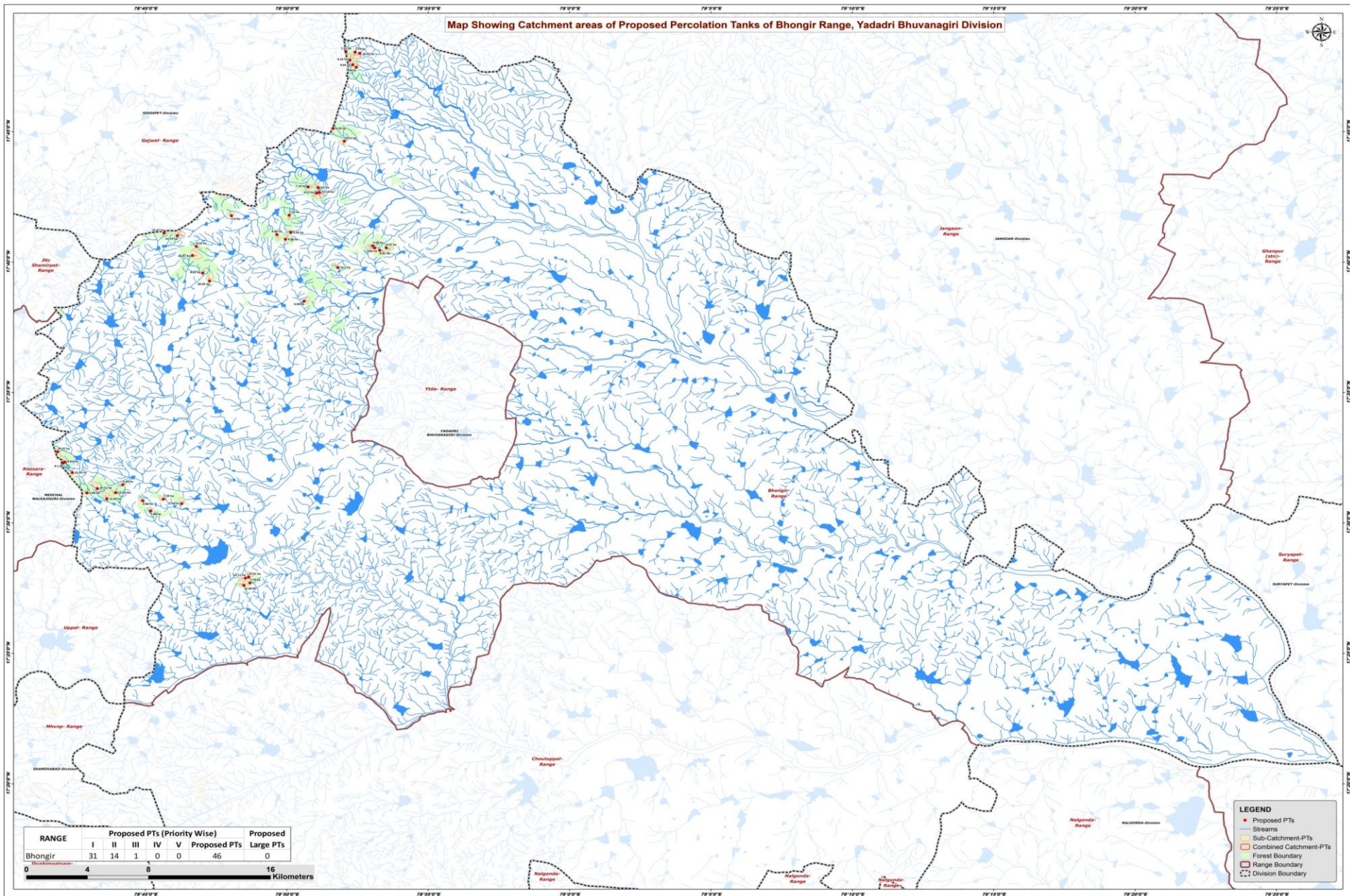


Map Showing Suitability index for Construction of SMC Works of Bhongir Range, Yadadri Bhuvanagiri Division



LEGEND	
● Proposed PTs	● CCTs/SCTs - Highly Suitable
● Existing CD/PTs	● CCTs/SCTs - Moderately Suitable
— Contours	● CCTs/SCTs - Least Suitable
— Streams	● PTs - Highly Suitable
- - - Watershed Boundary	● PTs - Moderately Suitable
- - - Compartment Boundary	● PTs - Least Suitable
- - - Beat Boundary	● MPTs and SGPs - Suitable
- - - Range Boundary	● Not Suitable
- - - Division Boundary	● Water Body

Map Showing Catchment areas of Proposed Percolation Tanks of Bhongir Range, Yadadri Bhuvanagiri Division



RANGE	Proposed PTs (Priority Wise)					Proposed Large PTs
	I	II	III	IV	V	
Bhongir	31	14	1	0	0	46

0 4 8 16 Kilometers

- LEGEND**
- Proposed PTs
 - Streams
 - Sub-Catchment-PTs
 - Combined Catchment-PTs
 - Forest Boundary
 - Range Boundary
 - Division Boundary

Beat wise Abstract of Proposed PT's – Bhongir Range

S. No.	Beat	Proposed PT's
1	BIBINAGAR	6
2	BOMMALA RAMARAM	11
3	DATTAIPALLY	5
4	JALASINGARAM	8
5	THURKAPALLY	1
6	VASALLAMARRY	6
7	VEERAREDDIPALLY	9
	Total	46

List of Proposed PTs – Bhongir Range

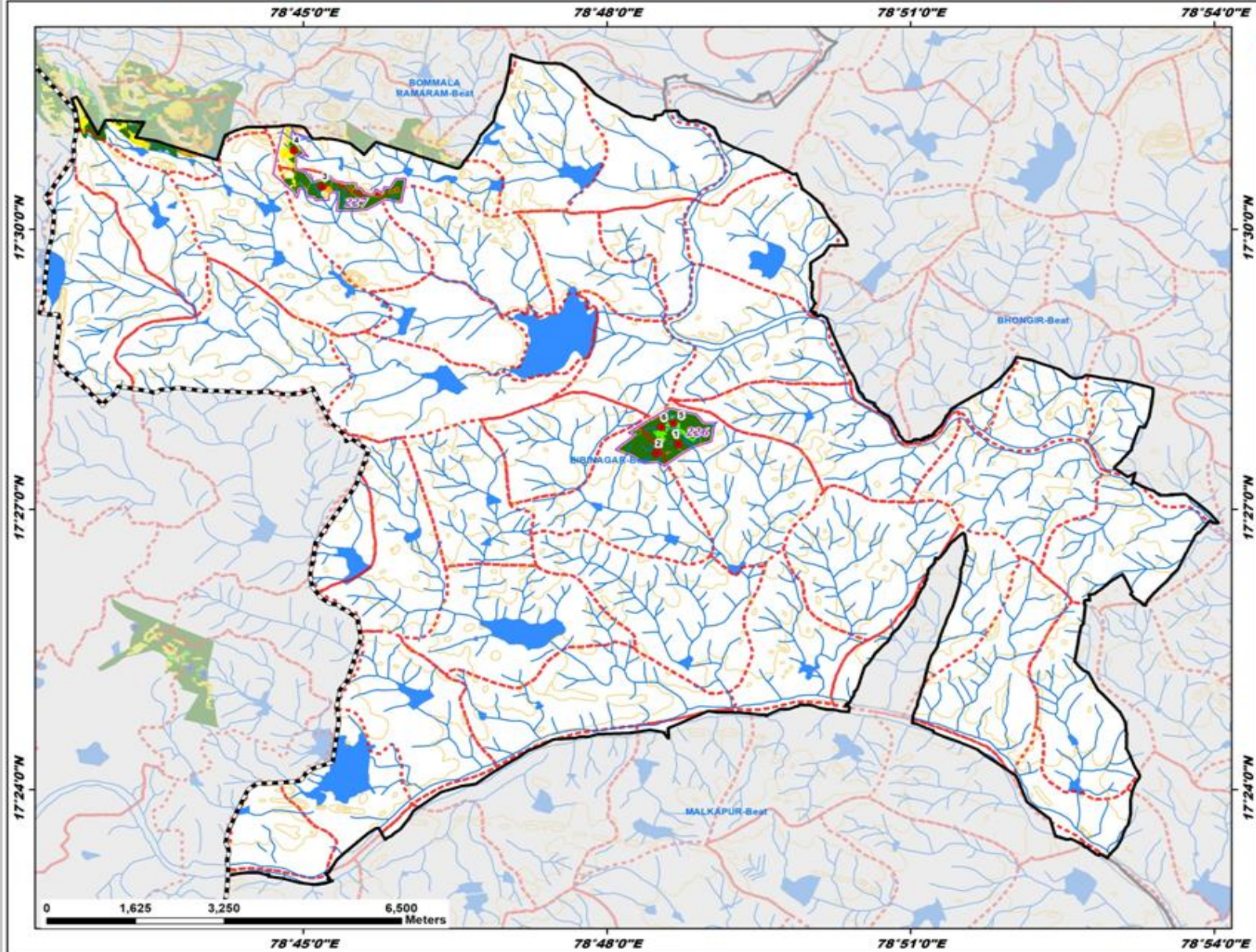
ID	Latitude	Longitude	Catchment Area_Ha	Priority	Beat
1	17.461654	78.811751	7.79	I	BIBINAGAR
2	17.460067	78.808136	14.38	I	BIBINAGAR
3	17.507631	78.753166	5.86	I	BIBINAGAR
4	17.514094	78.748494	6.88	I	BIBINAGAR
5	17.465428	78.810943	15.91	II	BIBINAGAR
6	17.464680	78.809019	12.11	II	BIBINAGAR
7	17.675632	78.885249	9.82	I	DATTAIPALLY
8	17.663138	78.863467	10.20	I	DATTAIPALLY
9	17.677059	78.884090	9.68	I	DATTAIPALLY
10	17.675780	78.892023	9.97	II	DATTAIPALLY
11	17.674194	78.888194	8.81	II	DATTAIPALLY
12	17.711084	78.852604	22.18	I	VEERAREDDIPALLY
13	17.710755	78.850839	6.57	I	VEERAREDDIPALLY
14	17.681182	78.832565	9.88	I	VEERAREDDIPALLY
15	17.696223	78.800740	7.60	I	VEERAREDDIPALLY
16	17.714248	78.851897	9.20	II	VEERAREDDIPALLY
17	17.696603	78.834743	7.24	II	VEERAREDDIPALLY
18	17.685543	78.835780	6.56	II	VEERAREDDIPALLY
19	17.684257	78.827490	9.86	II	VEERAREDDIPALLY
20	17.714663	78.845922	7.14	II	VEERAREDDIPALLY
21	17.743909	78.867311	12.51	I	JALASINGARAM
22	17.795734	78.870558	9.24	I	JALASINGARAM
23	17.800798	78.873628	7.74	I	JALASINGARAM
24	17.800061	78.876402	16.59	I	JALASINGARAM
25	17.791179	78.874298	7.66	I	JALASINGARAM
26	17.792708	78.872224	9.65	I	JALASINGARAM
27	17.752006	78.860704	6.29	II	JALASINGARAM
28	17.801109	78.868245	7.25	II	JALASINGARAM
29	17.512309	78.771440	11.34	I	BOMMALA RAMARAM
30	17.519286	78.732496	12.28	I	BOMMALA RAMARAM
31	17.538248	78.701381	9.10	I	BOMMALA RAMARAM
32	17.519139	78.715608	5.84	I	BOMMALA RAMARAM
33	17.524441	78.736757	5.46	I	BOMMALA RAMARAM
34	17.515224	78.760712	7.59	I	BOMMALA RAMARAM
35	17.538840	78.702713	8.62	I	BOMMALA RAMARAM
36	17.515383	78.727327	12.64	I	BOMMALA RAMARAM
37	17.521957	78.721729	20.51	I	BOMMALA RAMARAM
38	17.532118	78.706945	15.95	I	BOMMALA RAMARAM
39	17.545455	78.698323	29.47	II	BOMMALA RAMARAM
40	17.641725	78.843539	9.99	I	THURKAPALLY

ID	Latitude	Longitude	Catchment Area_Ha	Priority	Beat
41	17.654606	78.787844	20.05	I	VASALLAMARRY
42	17.659666	78.783799	8.62	I	VASALLAMARRY
43	17.676645	78.780012	9.14	I	VASALLAMARRY
44	17.685171	78.761032	15.41	II	VASALLAMARRY
45	17.670878	78.777725	26.87	II	VASALLAMARRY
46	17.683501	78.768897	31.74	III	VASALLAMARRY

Map Showing Suitability index for Construction of SMC Works of Bibinagar Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



ID	Latitude	Longitude	Catchment Area_Ha	Priority
1	17.461654	78.811751	7.79	I
2	17.460067	78.808136	14.38	I
3	17.507631	78.753166	5.86	I
4	17.514094	78.748494	6.88	I
5	17.465428	78.810943	15.91	II
6	17.464680	78.809019	12.11	II

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

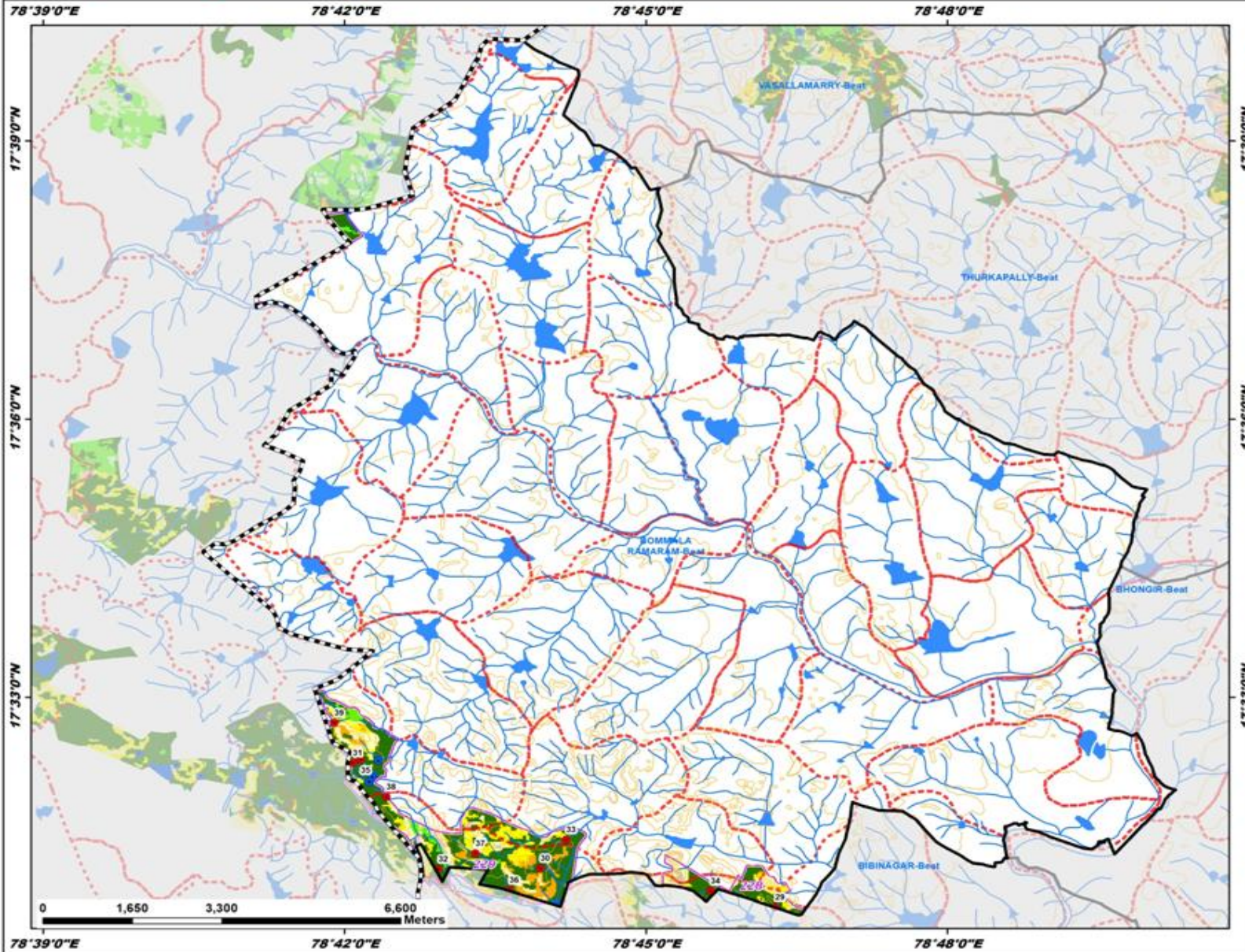
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGP's - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Bommala Ramaram Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



ID	Latitude	Longitude	Catchment Area_Ha	Priority
29	17.512309	78.771440	11.34	I
30	17.519286	78.732496	12.28	I
31	17.538248	78.701381	9.10	I
32	17.519139	78.715608	5.84	I
33	17.524441	78.736757	5.46	I
34	17.515224	78.760712	7.59	I
35	17.538840	78.702713	8.62	I
36	17.515383	78.727327	12.64	I
37	17.521957	78.721729	20.51	I
38	17.532118	78.706945	15.95	I
39	17.545455	78.698323	29.47	II

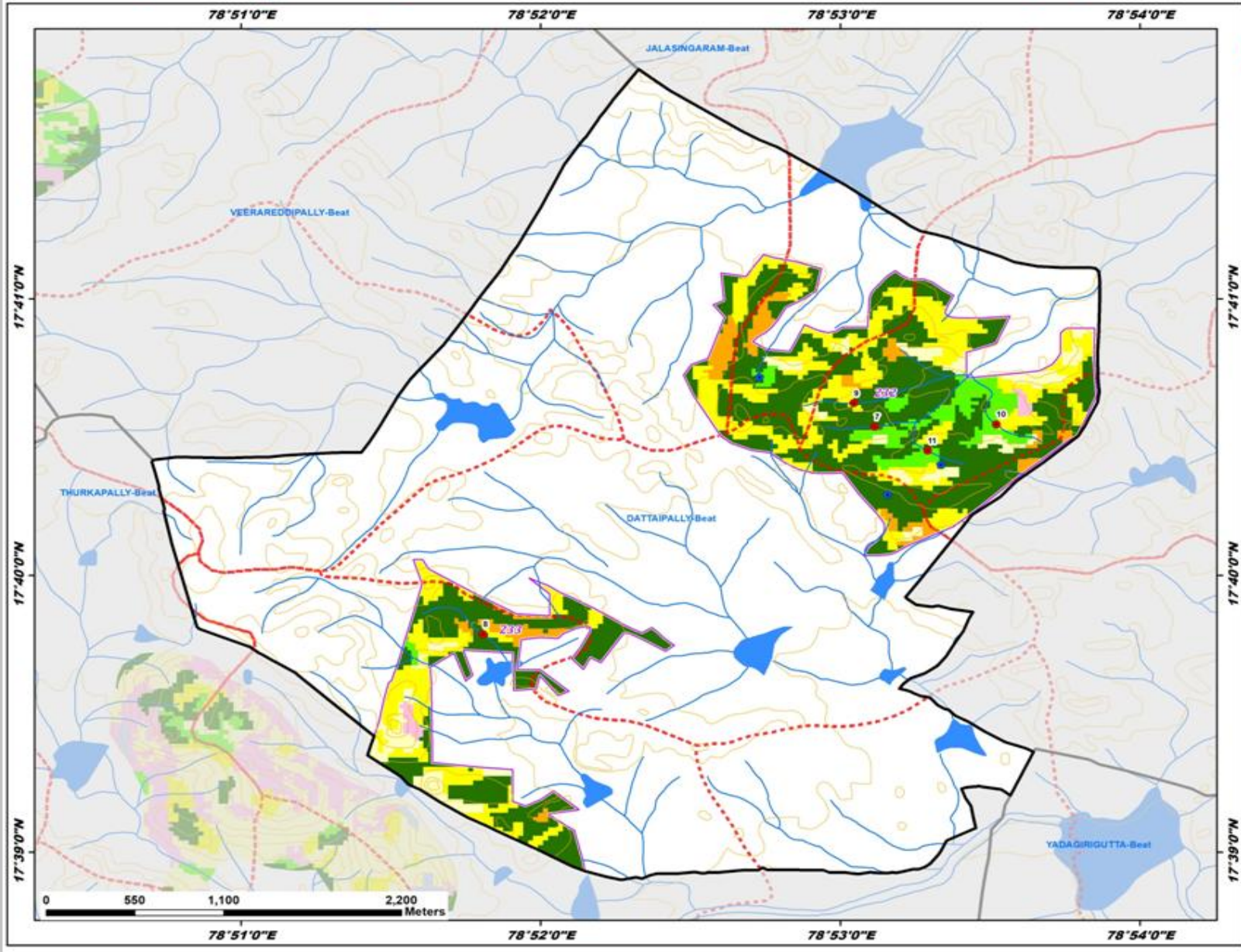
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - - - Watershed Boundary
 - Compartment Boundary
 - Beat Boundary
 - - - Division Boundary
- ### Suitability Index
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGPs - Suitable
 - Not Suitable
 - Water Body

Map Showing Suitability index for Construction of SMC Works of Dattaipally Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



ID	Latitude	Longitude	Catchment Area_Ha	Priority
7	17.675632	78.885249	9.82	I
8	17.663138	78.863467	10.20	I
9	17.677059	78.884090	9.68	I
10	17.675780	78.882023	9.97	II
11	17.674194	78.888194	8.81	II

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

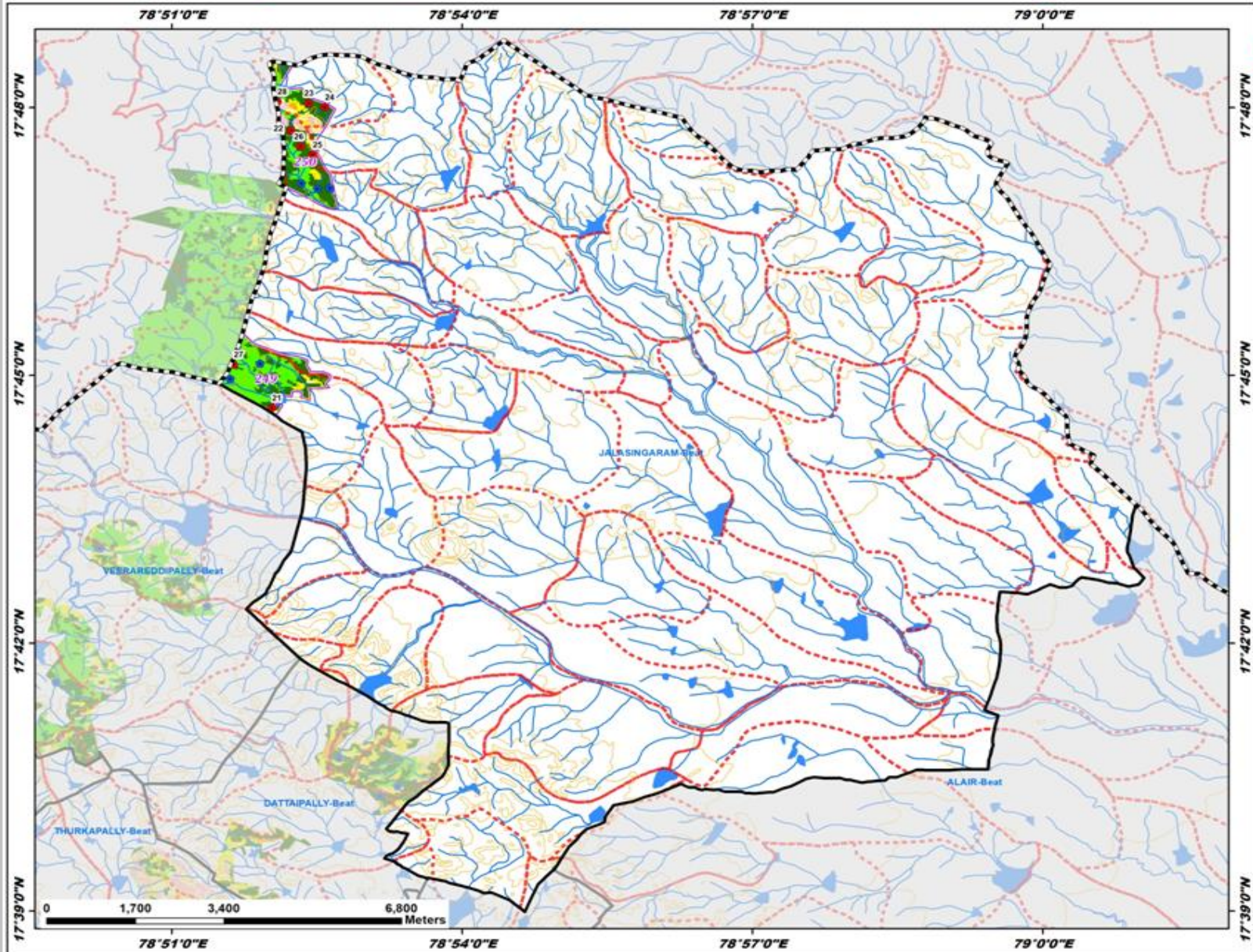
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Jalasingaram Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



ID	Latitude	Longitude	Catchment Area_Ha	Priority
21	17.743909	78.867311	12.51	I
22	17.795734	78.870558	9.24	I
23	17.800798	78.873628	7.74	I
24	17.800061	78.876402	16.59	I
25	17.791179	78.874298	7.66	I
26	17.792708	78.872224	9.65	I
27	17.752006	78.860704	6.29	II
28	17.801109	78.868245	7.25	II

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

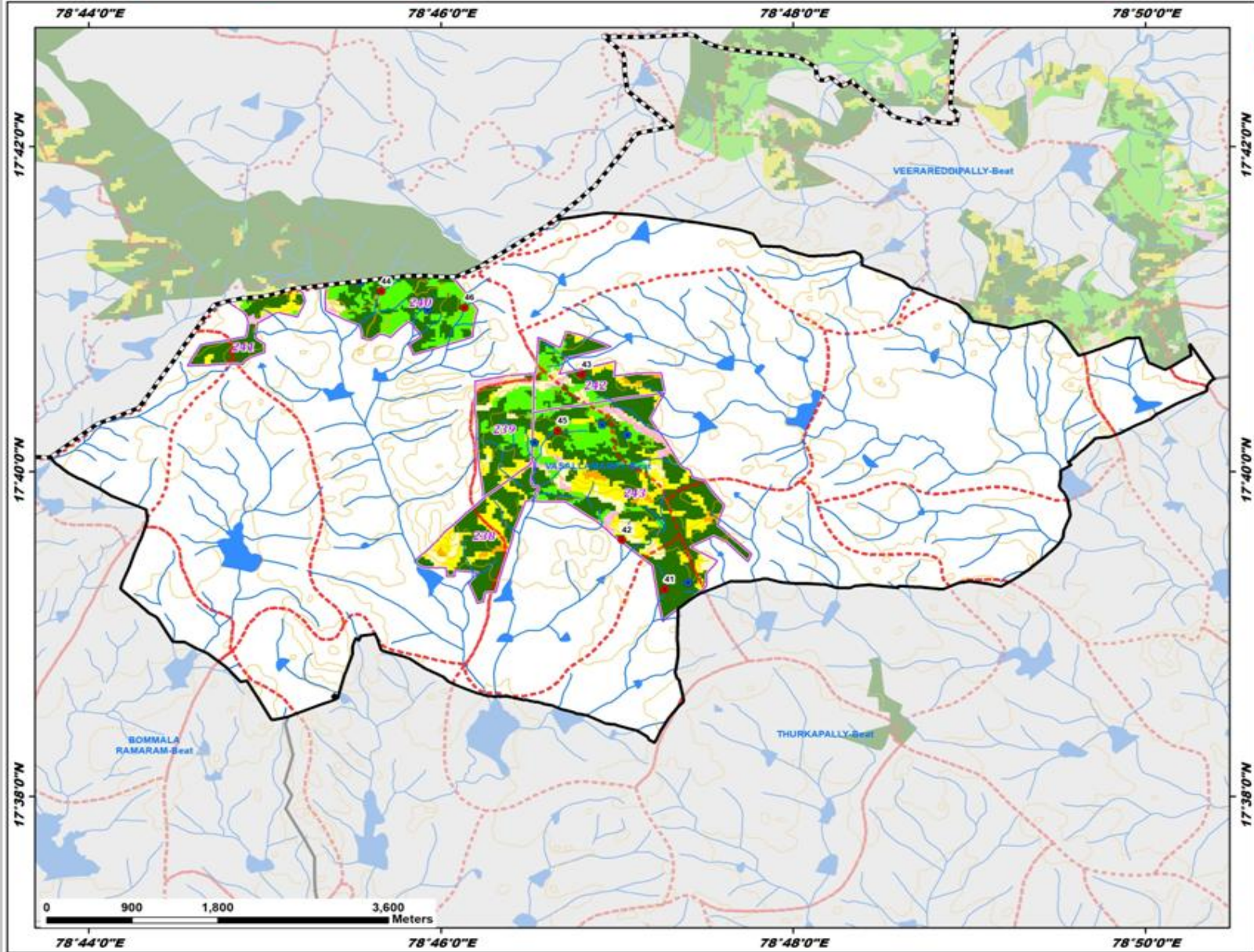
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Vasallamarry Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



ID	Latitude	Longitude	Catchment Area_Ha	Priority
41	17.654606	78.787844	20.05	I
42	17.659666	78.783799	8.62	I
43	17.676645	78.780012	9.14	I
44	17.685171	78.761032	15.41	II
45	17.670878	78.777725	26.87	II
46	17.683501	78.768897	31.74	III

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

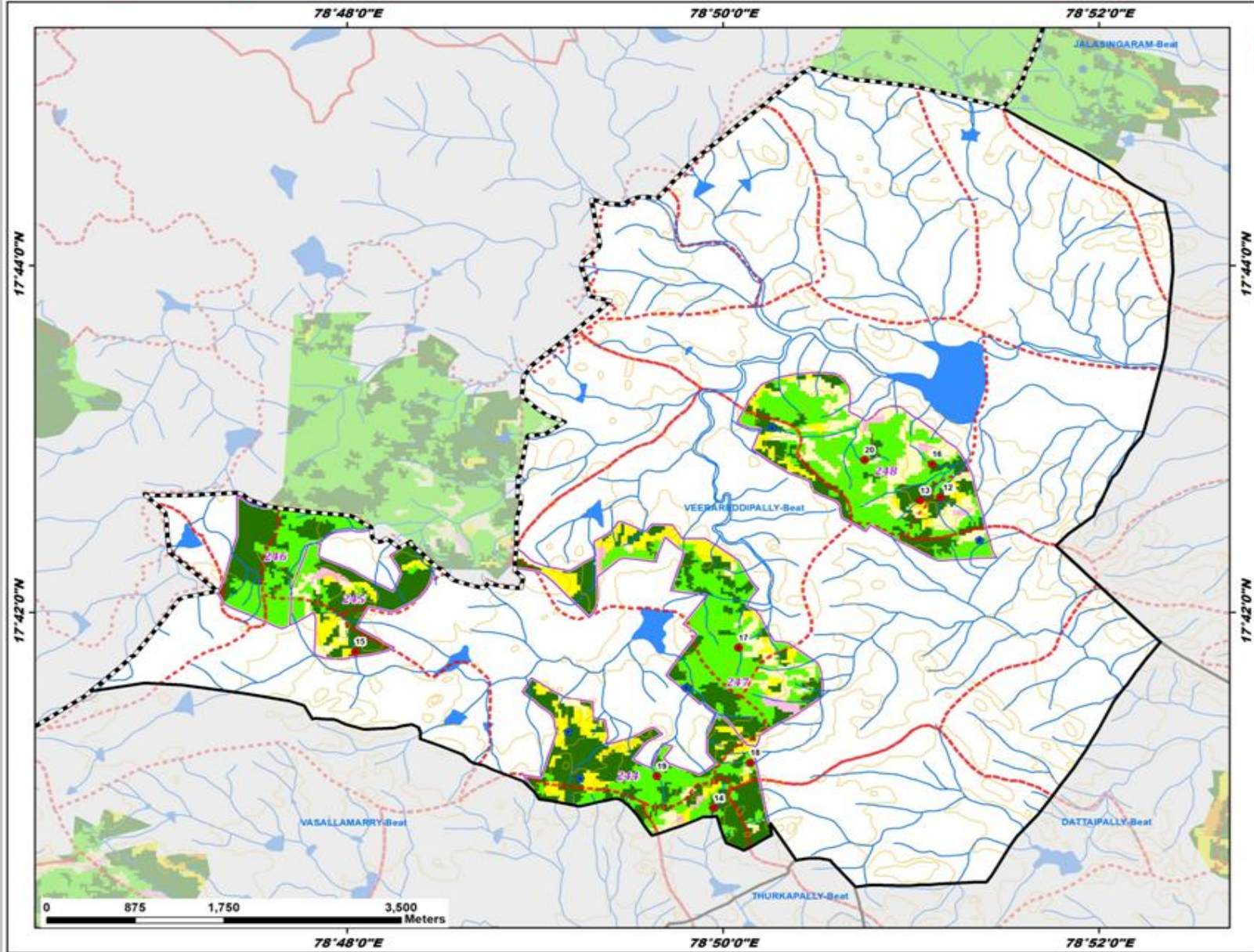
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Veerareddipally Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



ID	Latitude	Longitude	Catchment Area_Ha	Priority
12	17.711084	78.852604	22.18	I
13	17.710755	78.850839	6.57	I
14	17.681182	78.832565	9.88	I
15	17.696223	78.800740	7.60	I
16	17.714248	78.851897	9.20	II
17	17.696603	78.834743	7.24	II
18	17.685543	78.835780	6.56	II
19	17.684257	78.827490	9.86	II
20	17.714663	78.845922	7.14	II

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

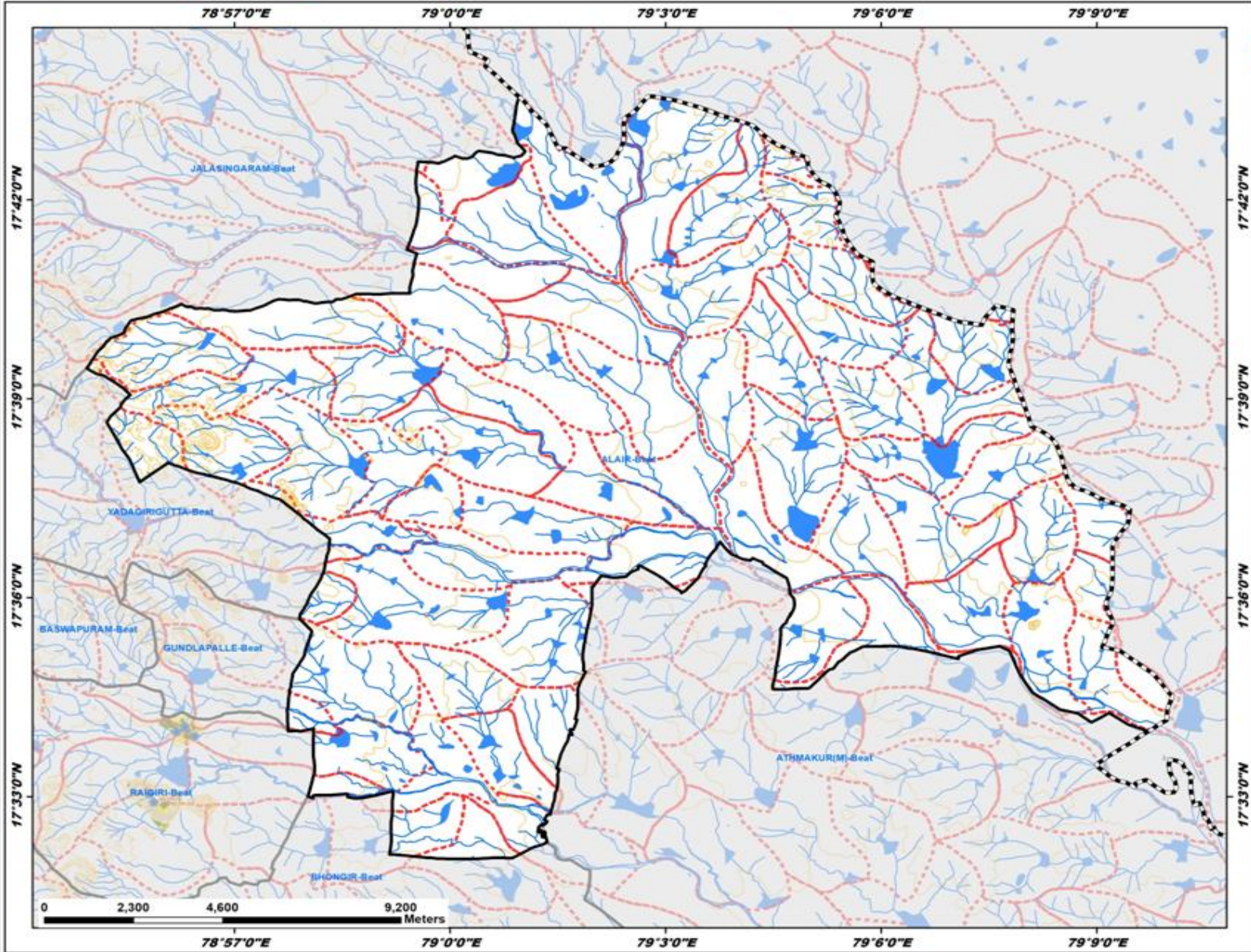
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Alair Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

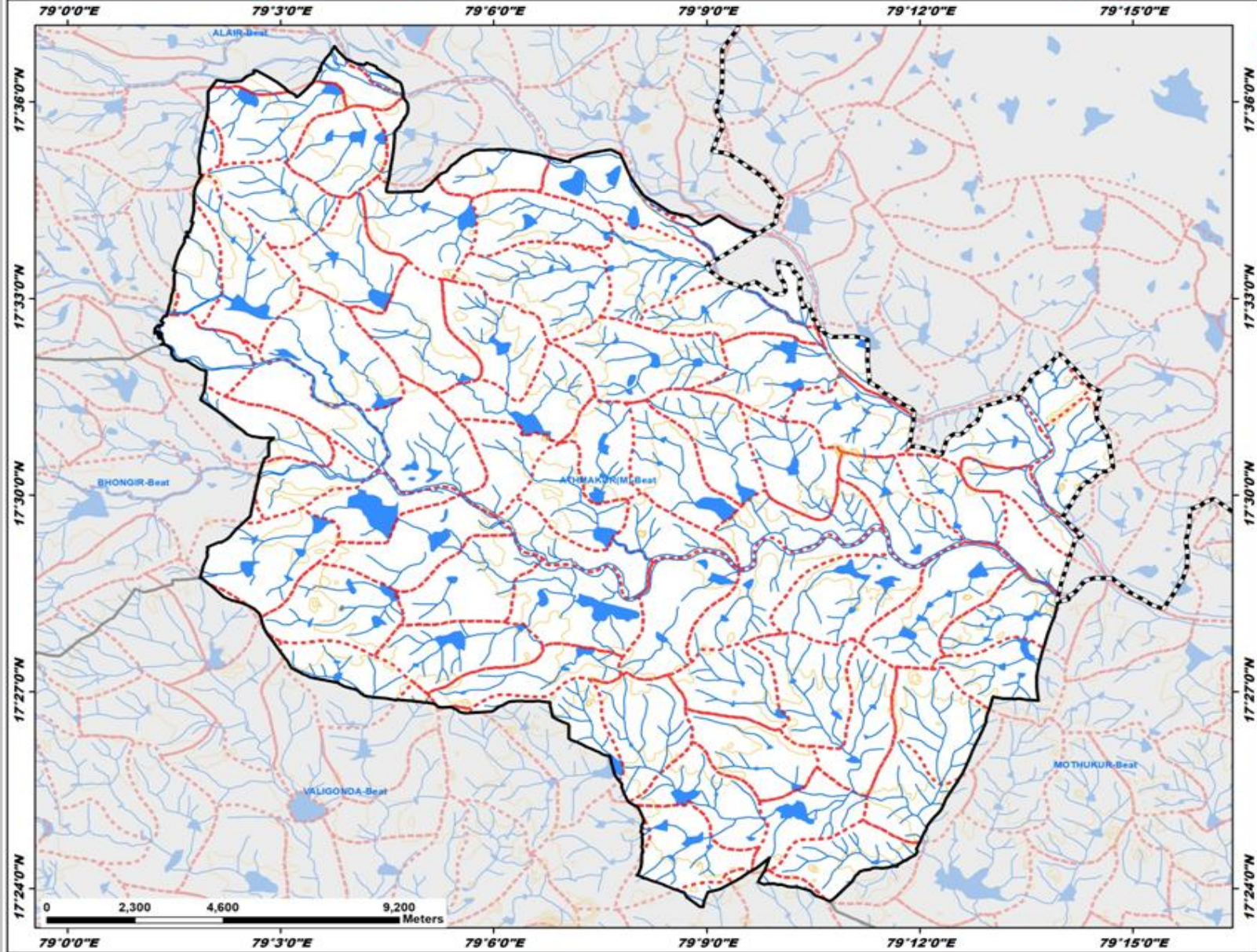
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Athmakur(M) Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

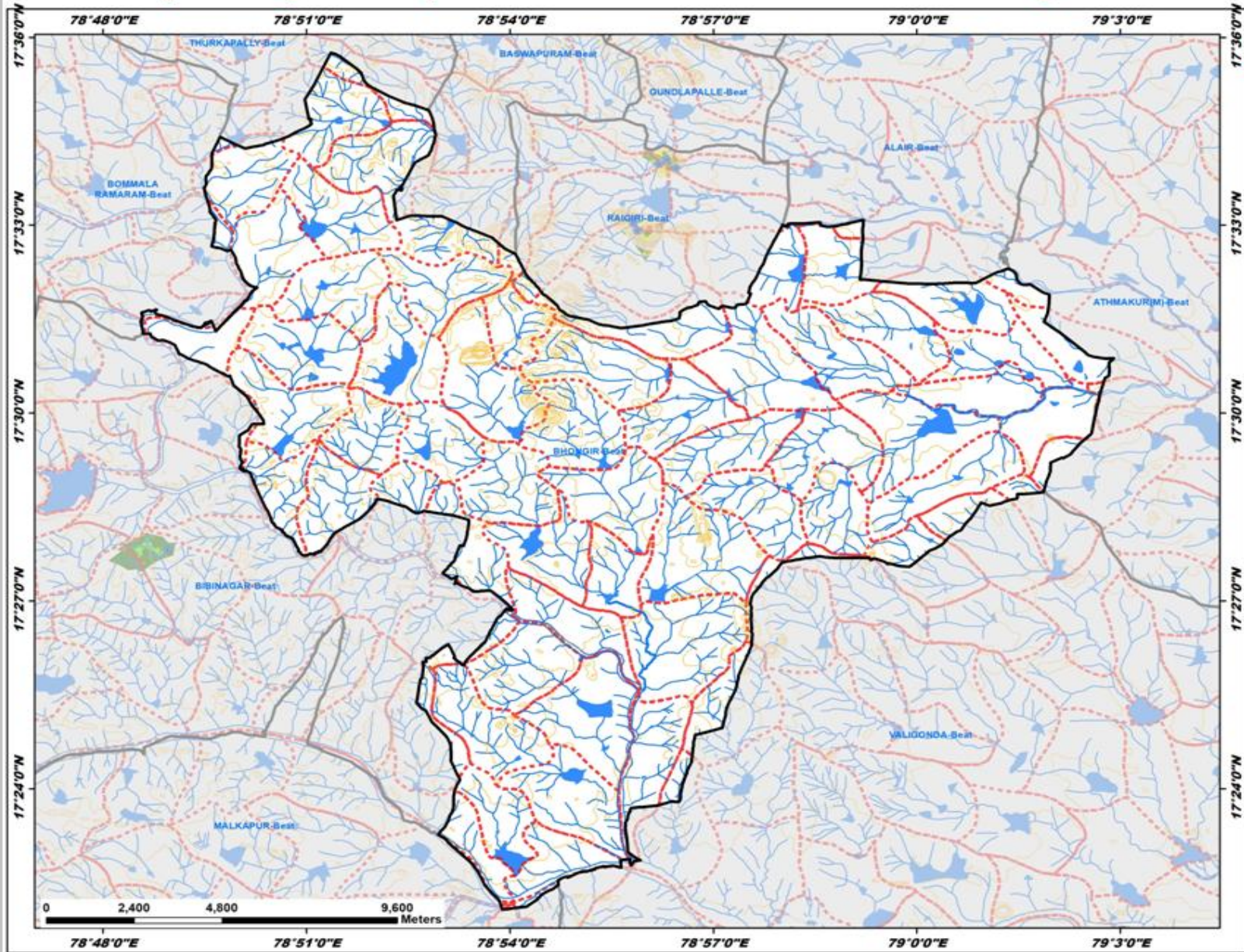
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Bhongir Beat



Division : Yadadri Bhuvanagiri
Range : Bhongir



Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

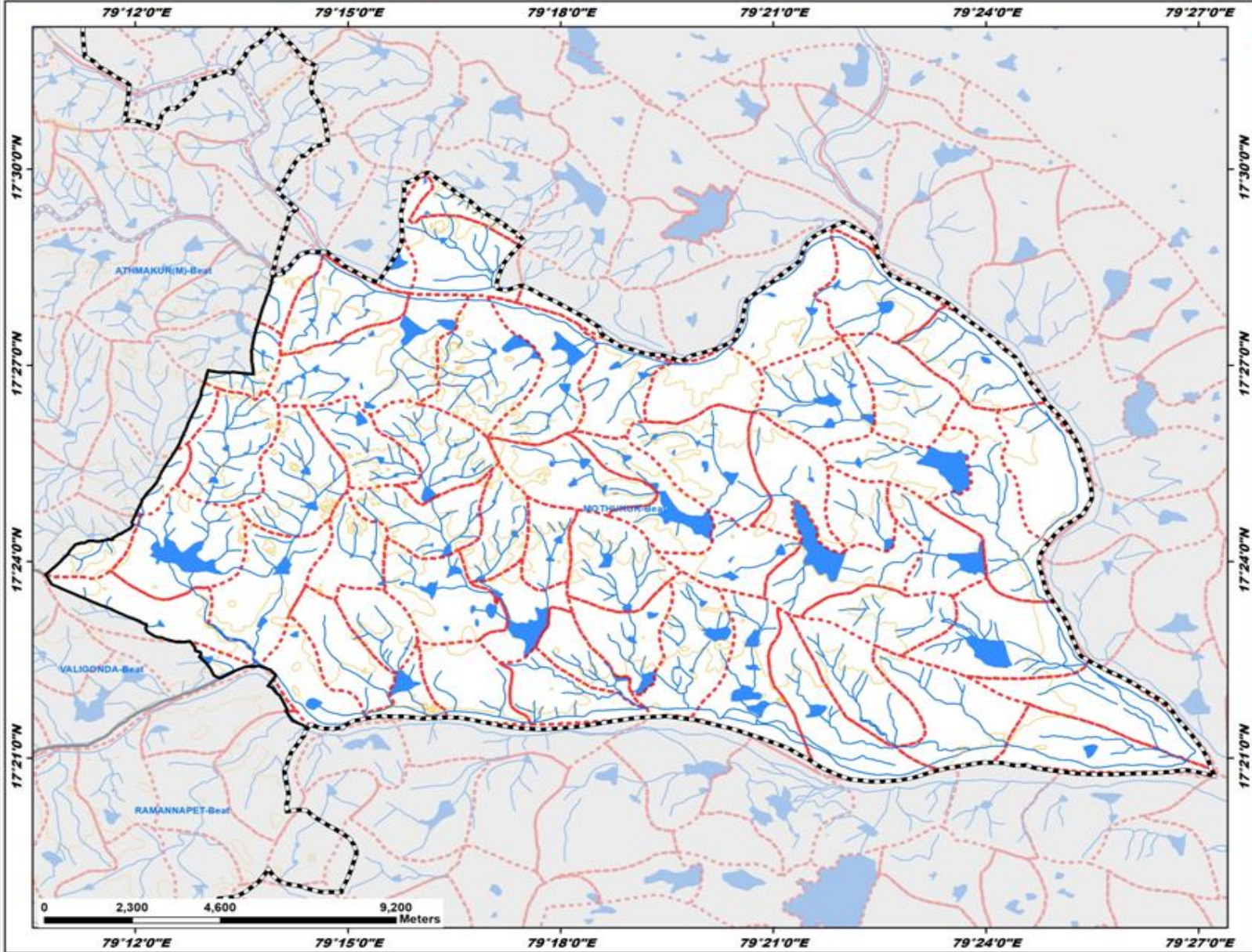
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Mothukur Beat



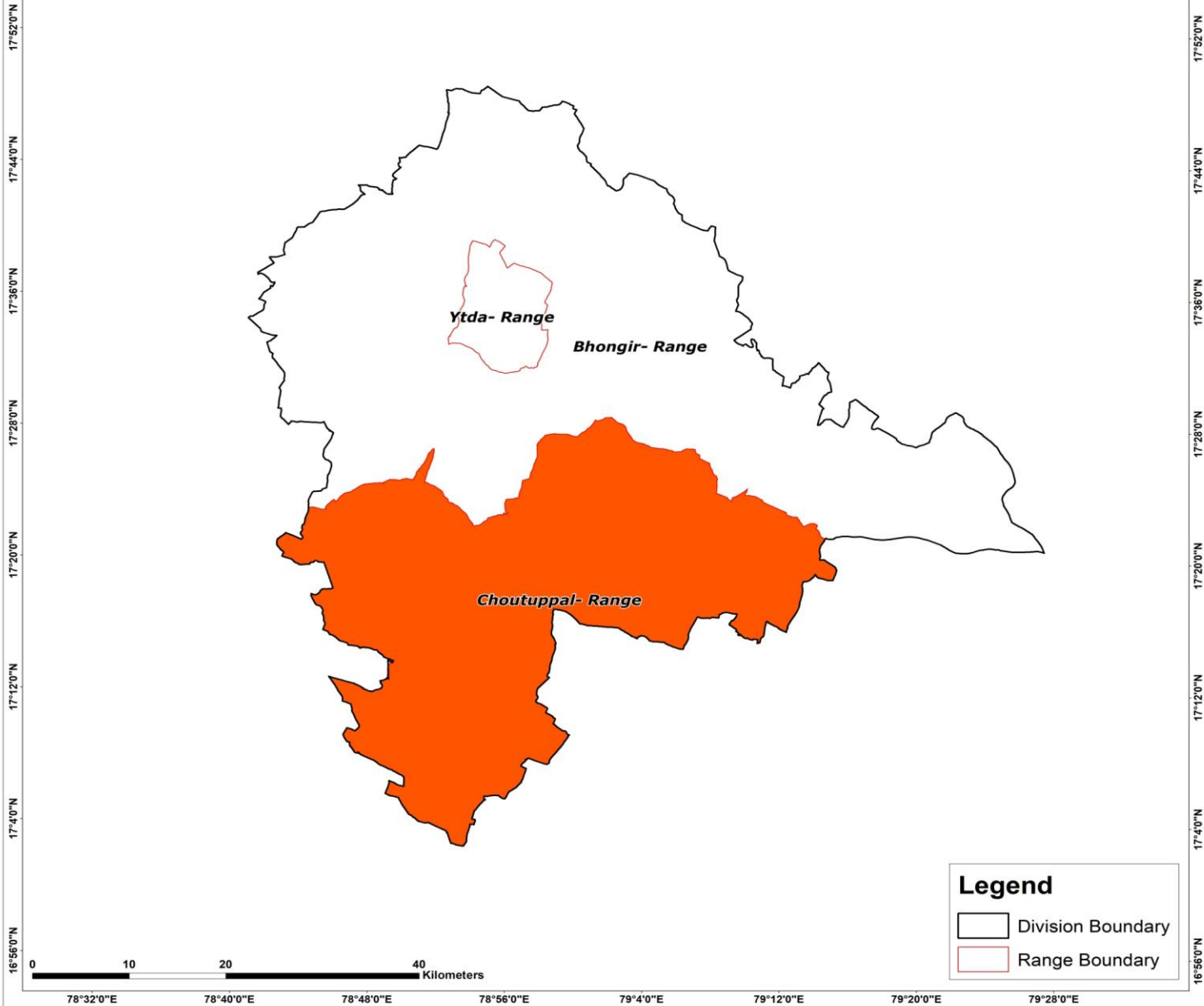
Division : Yadadri Bhuvanagiri
Range : Bhongir



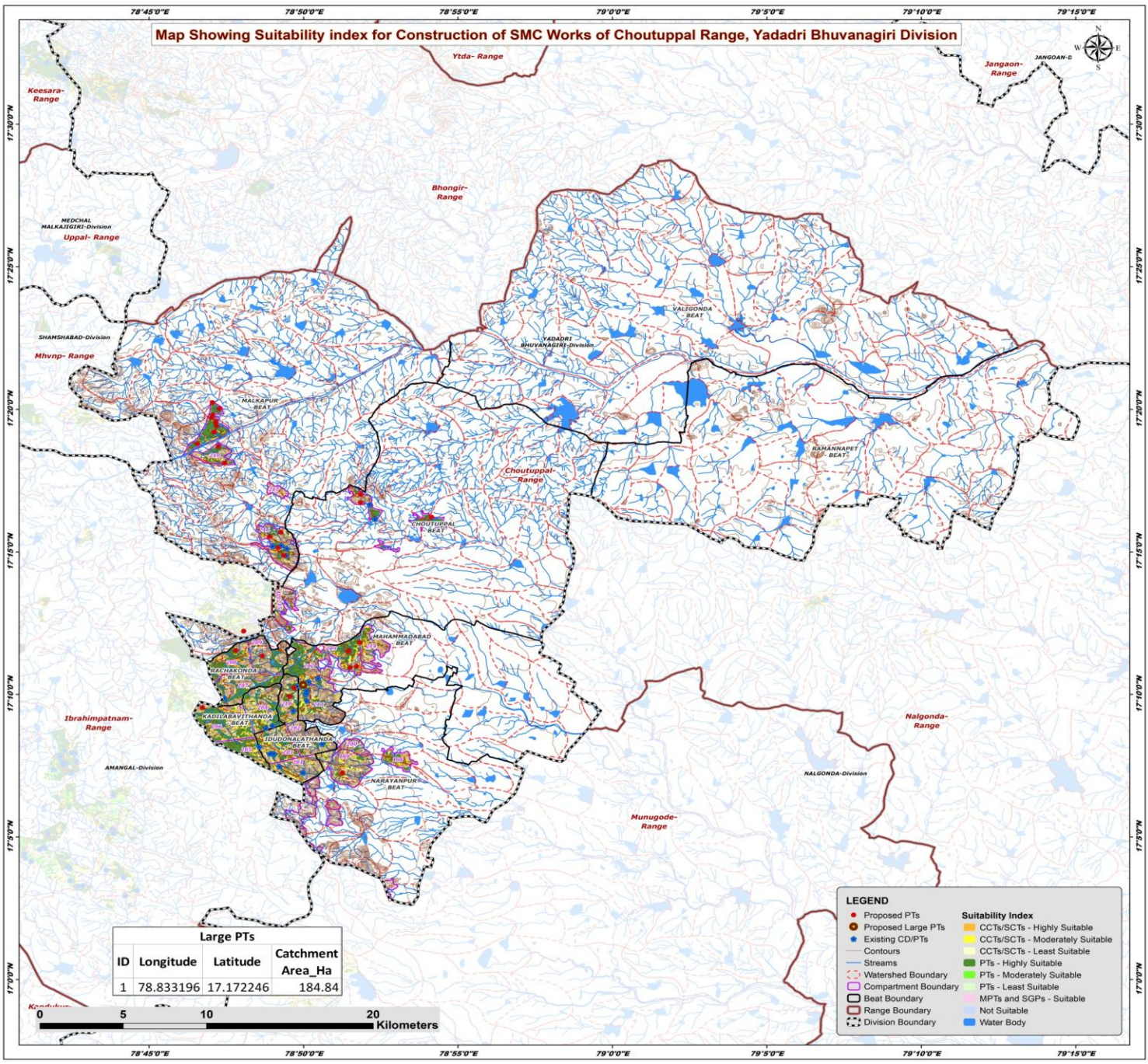
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - Watershed Boundary
 - Compartment Boundary
 - Beat Boundary
 - Division Boundary
- ### Suitability Index
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGPs - Suitable
 - Not Suitable
 - Water Body

Map Showing Choutuppal Range in Yadadri Bhuvanagiri Division



Map Showing Suitability index for Construction of SMC Works of Choutuppal Range, Yadadri Bhuvanagiri Division



Large PTs			
ID	Longitude	Latitude	Catchment Area_Ha
1	78.833196	17.172246	184.84

LEGEND

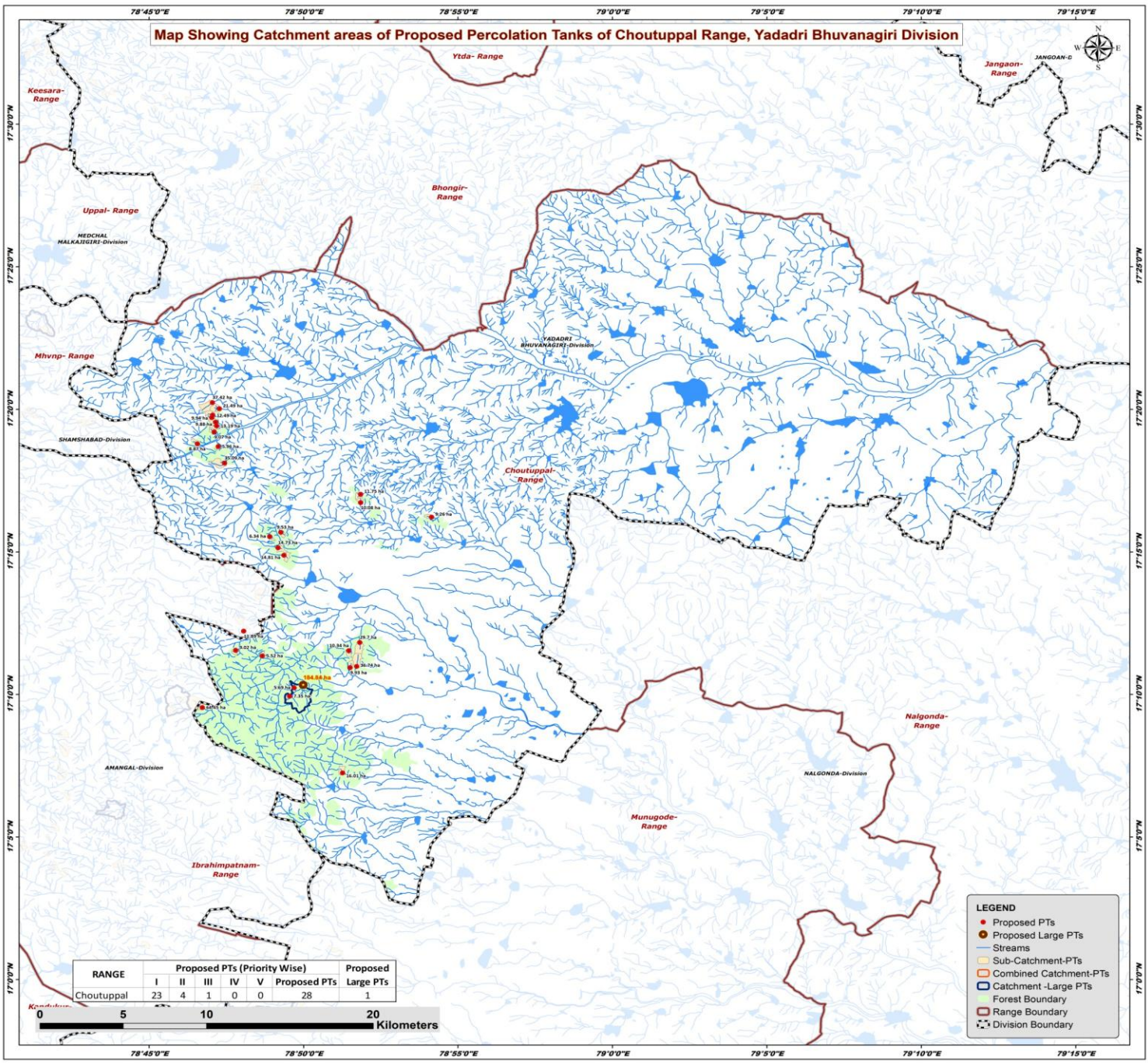
- Proposed PTs
- Proposed Large PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Range Boundary
- Division Boundary

Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body



Map Showing Catchment areas of Proposed Percolation Tanks of Choutuppal Range, Yadadri Bhuvanagiri Division



RANGE	Proposed PTs (Priority Wise)					Proposed Large PTs
	I	II	III	IV	V	
Choutuppal	23	4	1	0	0	28



- LEGEND**
- Proposed PTs
 - Proposed Large PTs
 - Streams
 - ▭ Sub-Catchment-PTs
 - ▭ Combined Catchment-PTs
 - ▭ Catchment -Large PTs
 - ▭ Forest Boundary
 - ▭ Range Boundary
 - ▭ Division Boundary

Beat wise Abstract of Proposed PT's – Choutuppal Range

S. No.	Beat	Proposed PT's
1	CHOUTUPPAL	4
2	IDUDONALATHANDA	2
3	KADILABAVITHANDA	1
4	MAHAMMADABAD	4
5	MALKAPUR	14
6	NARAYANPUR	1
7	RACHAKONDA	2
	Total	28

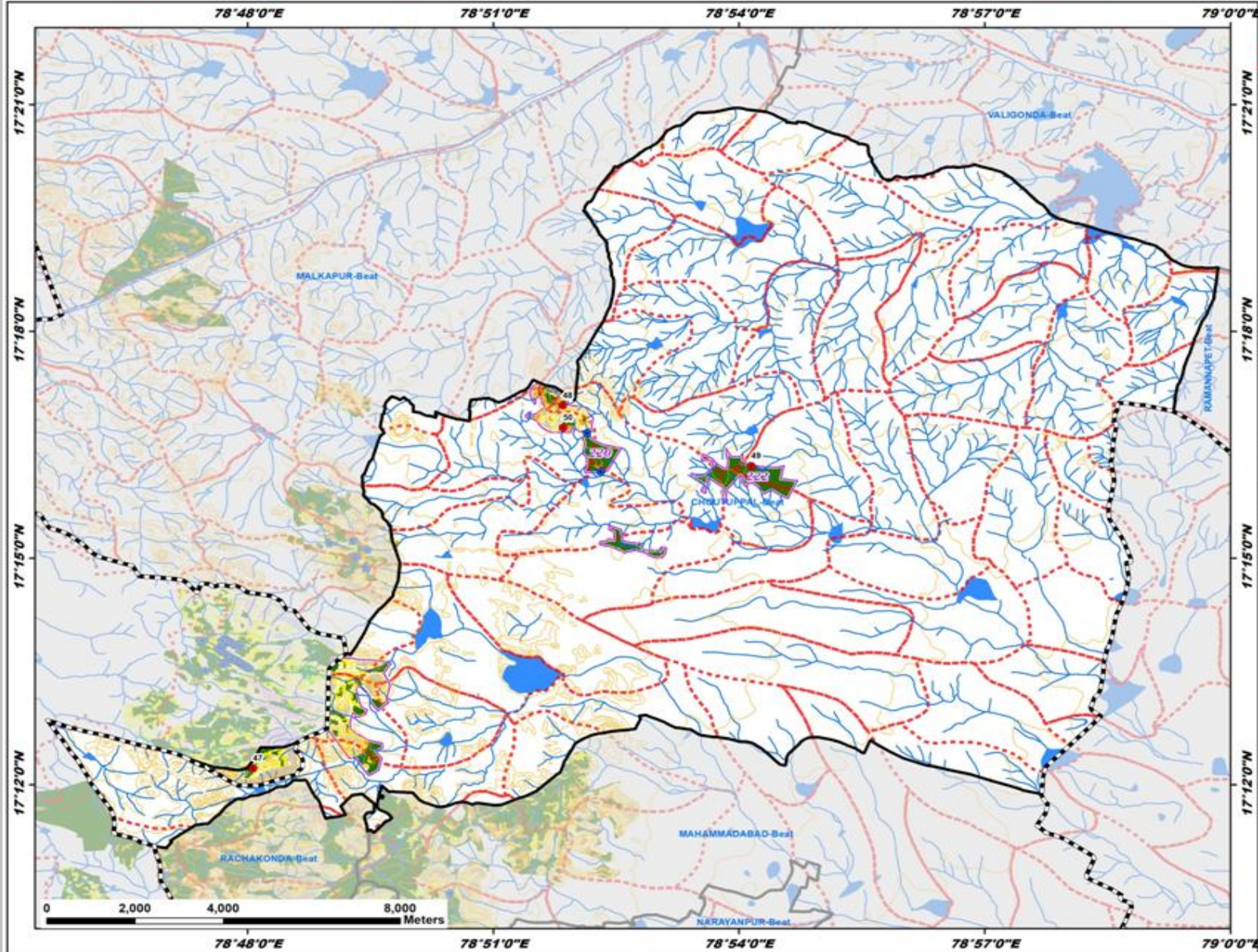
List of Proposed PTs – Choutuppal Range

ID	Latitude	Longitude	Catchment Area_Ha	Priority	Beat
47	17.203673	78.801096	11.89	I	CHOUTUPPAL
48	17.283693	78.864215	11.75	I	CHOUTUPPAL
49	17.270360	78.902514	9.26	I	CHOUTUPPAL
50	17.278801	78.864228	10.08	I	CHOUTUPPAL
51	17.182387	78.858562	9.93	I	MAHAMMADABAD
52	17.192256	78.857818	10.34	I	MAHAMMADABAD
53	17.197041	78.863730	29.70	II	MAHAMMADABAD
54	17.183093	78.862021	36.74	II	MAHAMMADABAD
55	17.328534	78.783861	9.94	I	MALKAPUR
56	17.261451	78.821134	9.53	I	MALKAPUR
57	17.320099	78.785197	9.07	I	MALKAPUR
58	17.258993	78.815165	6.34	I	MALKAPUR
59	17.330007	78.784357	12.49	I	MALKAPUR
60	17.313174	78.776105	8.87	I	MALKAPUR
61	17.323626	78.786560	13.19	I	MALKAPUR
62	17.252467	78.819615	14.73	I	MALKAPUR
63	17.248023	78.822786	14.81	I	MALKAPUR
64	17.311642	78.787383	5.96	I	MALKAPUR
65	17.325905	78.785966	9.88	I	MALKAPUR
66	17.333726	78.787950	21.49	I	MALKAPUR
67	17.337311	78.784238	37.42	II	MALKAPUR
68	17.301904	78.790737	35.09	II	MALKAPUR
69	17.165673	78.825951	7.35	I	IDUDONALATHANDA
70	17.170497	78.828363	5.69	I	IDUDONALATHANDA
71	17.159056	78.778747	64.45	III	KADILABAVITHANDA
72	17.120811	78.854474	16.01	I	NARAYANPUR
73	17.192417	78.796859	9.02	I	RACHAKONDA
74	17.189247	78.811134	5.52	I	RACHAKONDA

Map Showing Suitability index for Construction of SMC Works of Choutuppal Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
47	17.203673	78.801096	11.89	I
48	17.283693	78.864215	11.75	I
49	17.270360	78.902514	9.26	I
50	17.278801	78.864228	10.08	I

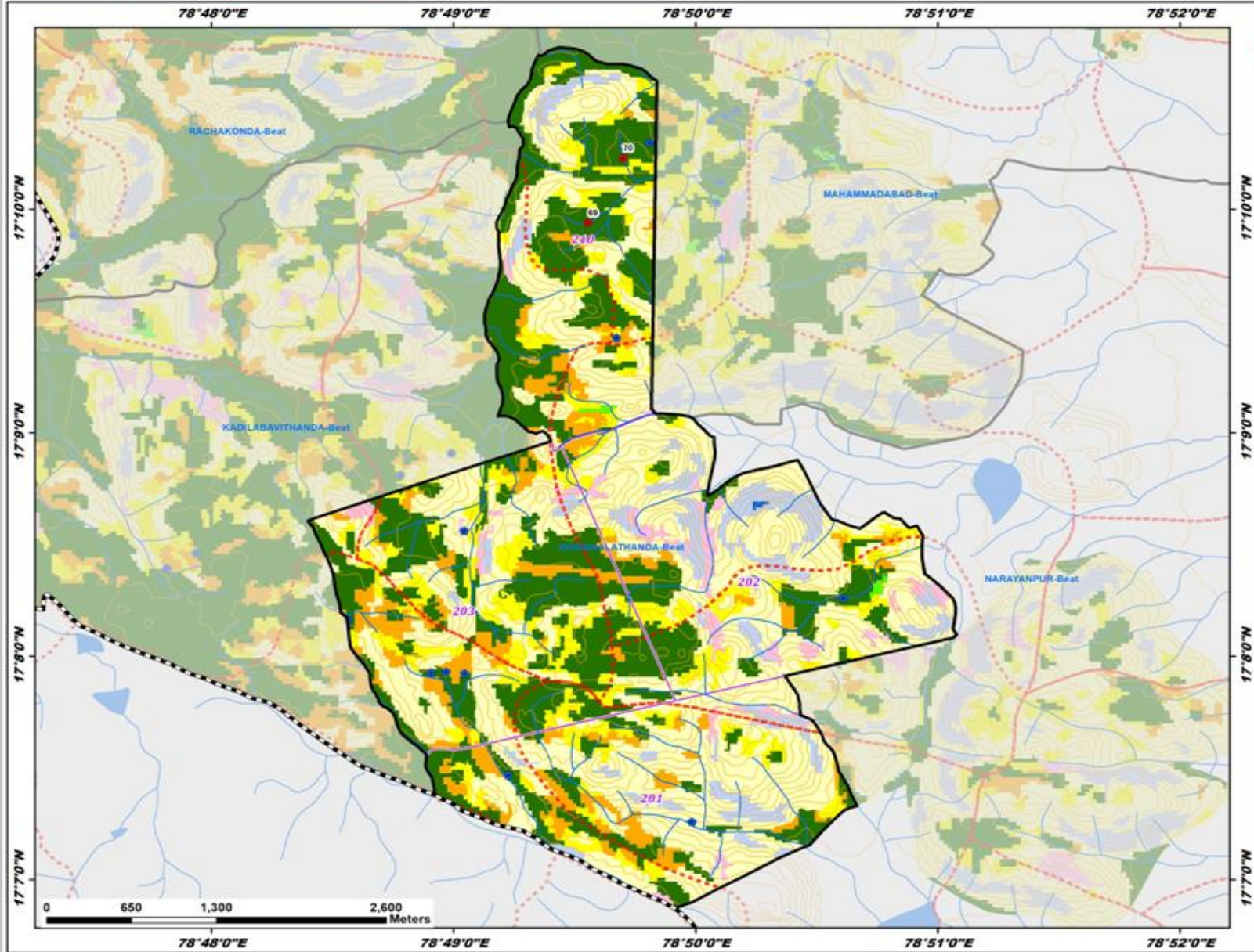
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - - - Watershed Boundary
 - Compartment Boundary
 - Beat Boundary
 - - - Division Boundary
- ### Suitability Index
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGP - Suitable
 - Not Suitable
 - Water Body

Map Showing Suitability index for Construction of SMC Works of Idudonalathanda Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
69	17.165673	78.825951	7.35	I
70	17.170497	78.828363	5.69	I

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

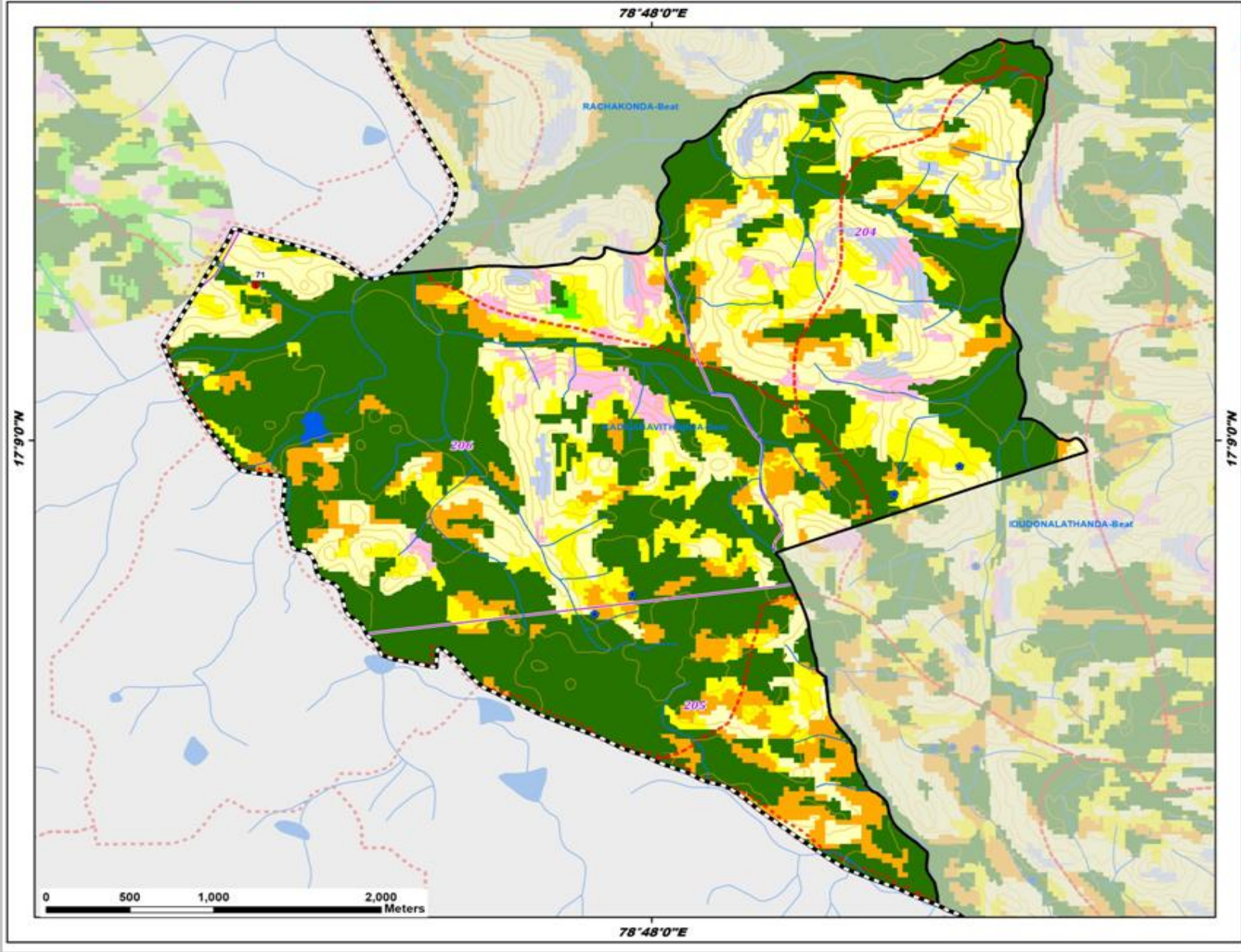
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Kadilabavithanda Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
71	17.159056	78.778747	64.45	III

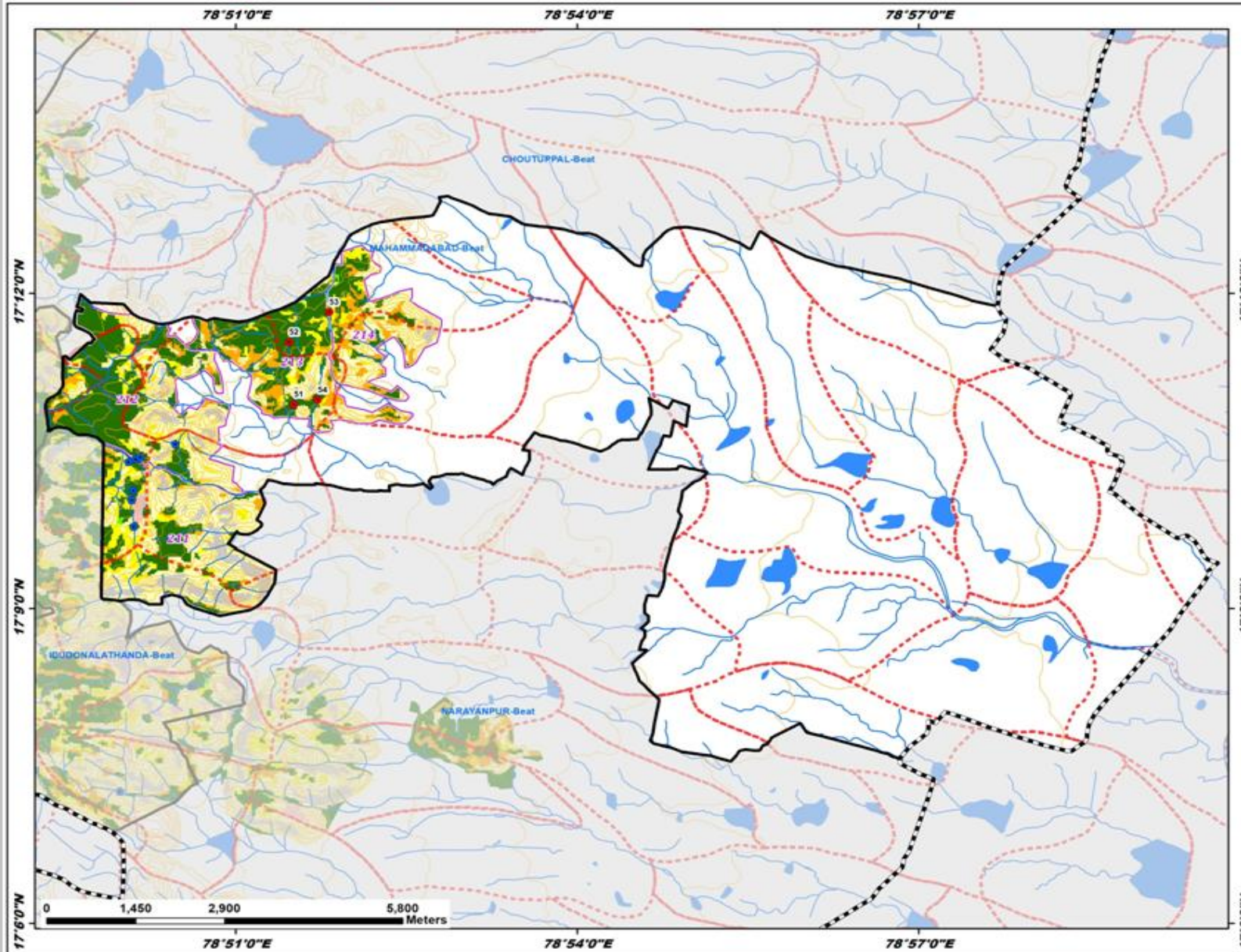
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - Watershed Boundary
 - Compartment Boundary
 - Beat Boundary
 - Division Boundary
- Suitability Index**
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGPs - Suitable
 - Not Suitable
 - Water Body

Map Showing Suitability index for Construction of SMC Works of Mahammadabad Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
S1	17.182387	78.858562	9.93	I
S2	17.192256	78.857818	10.34	I
S3	17.197041	78.863730	29.70	II
S4	17.183093	78.862021	36.74	II

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

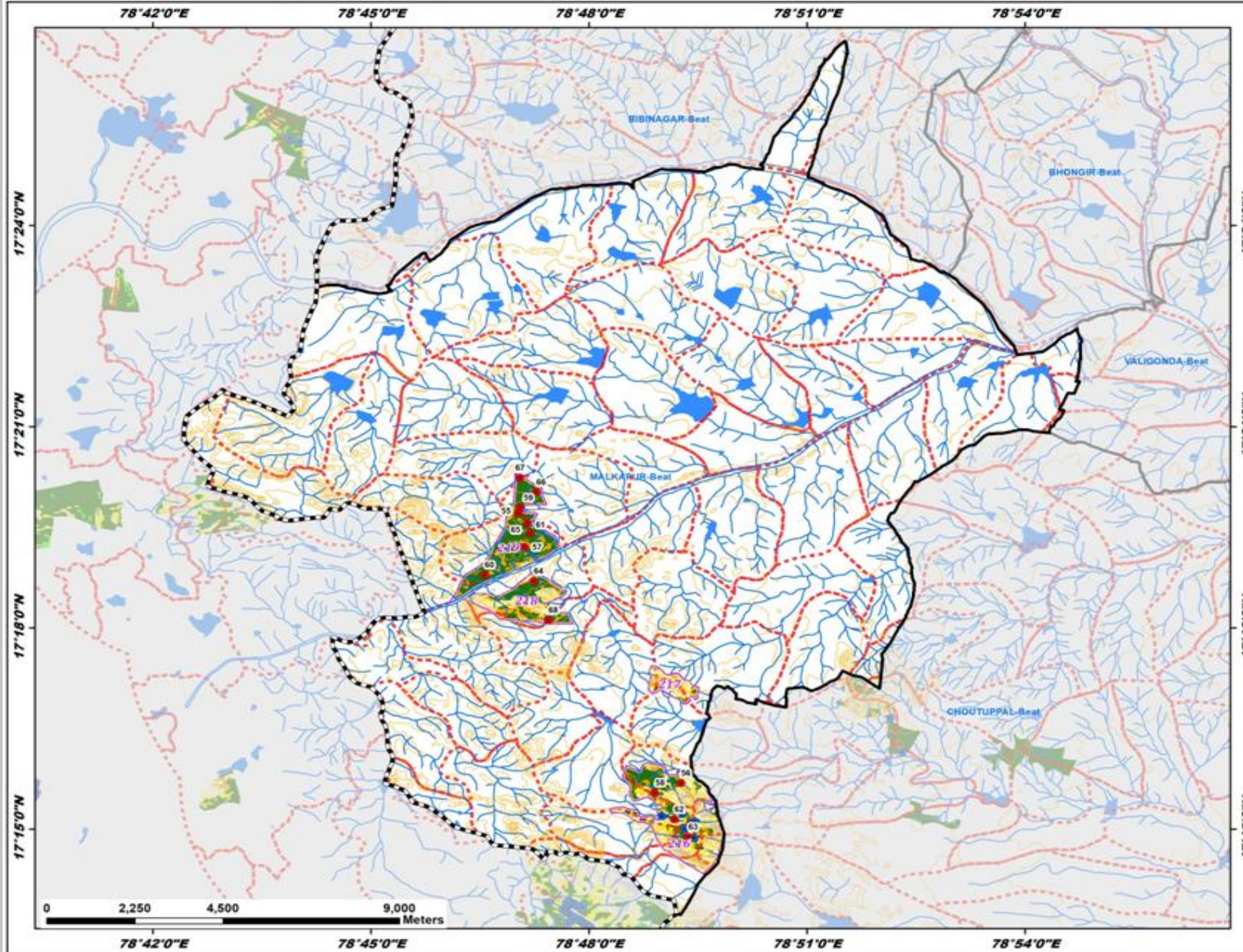
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPts - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Malkapur Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
55	17.328534	78.783861	9.94	I
56	17.261451	78.821134	9.53	I
57	17.320099	78.785197	9.07	I
58	17.258993	78.815165	6.34	I
59	17.330007	78.784357	12.49	I
60	17.313174	78.776105	8.87	I
61	17.323626	78.786560	13.19	I
62	17.252467	78.819615	14.73	I
63	17.248023	78.822786	14.81	I
64	17.311642	78.787383	5.96	I
65	17.325905	78.785966	9.88	I
66	17.333726	78.787950	21.49	I
67	17.337311	78.784238	37.42	II
68	17.301904	78.790737	35.09	II

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- - - Watershed Boundary
- Compartment Boundary
- Beat Boundary
- - - Division Boundary

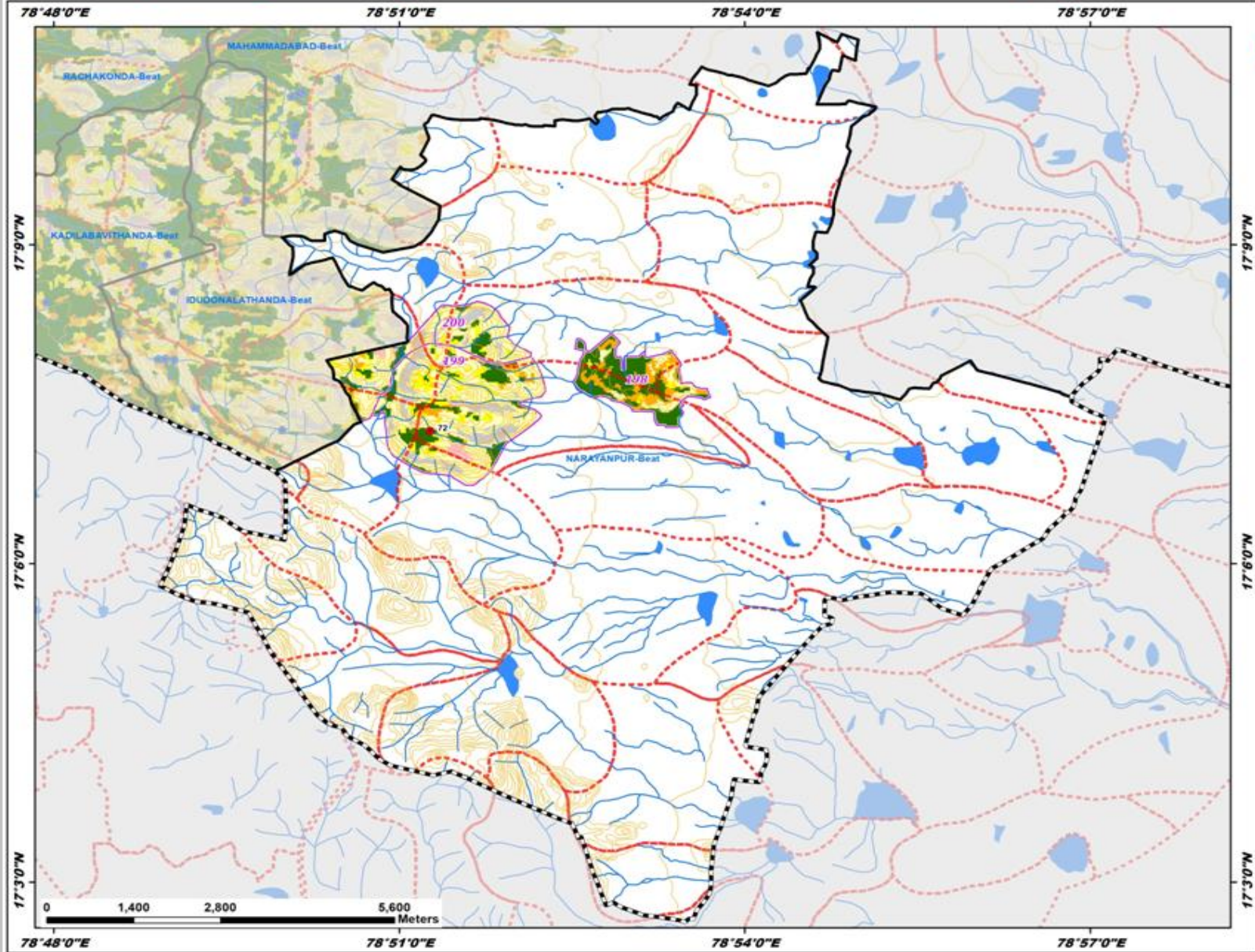
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Narayanpur Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
72	17.120811	78.854474	16.01	I

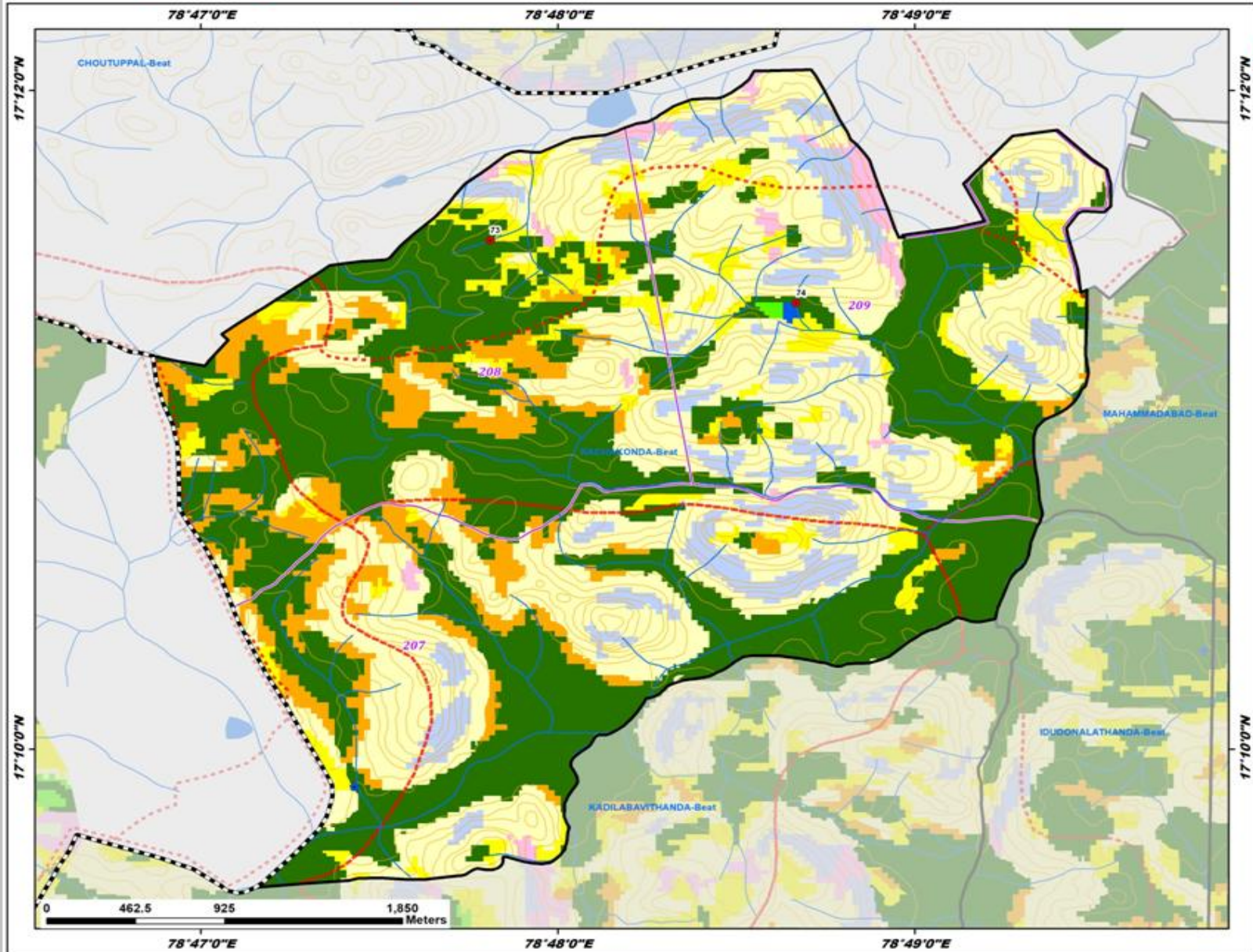
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - - - Watershed Boundary
 - Compartment Boundary
 - Beat Boundary
 - - - Division Boundary
- Suitability Index**
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGPs - Suitable
 - Not Suitable
 - Water Body

Map Showing Suitability index for Construction of SMC Works of Rachakonda Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
73	17.192417	78.796859	9.02	I
74	17.189247	78.811134	5.52	I

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

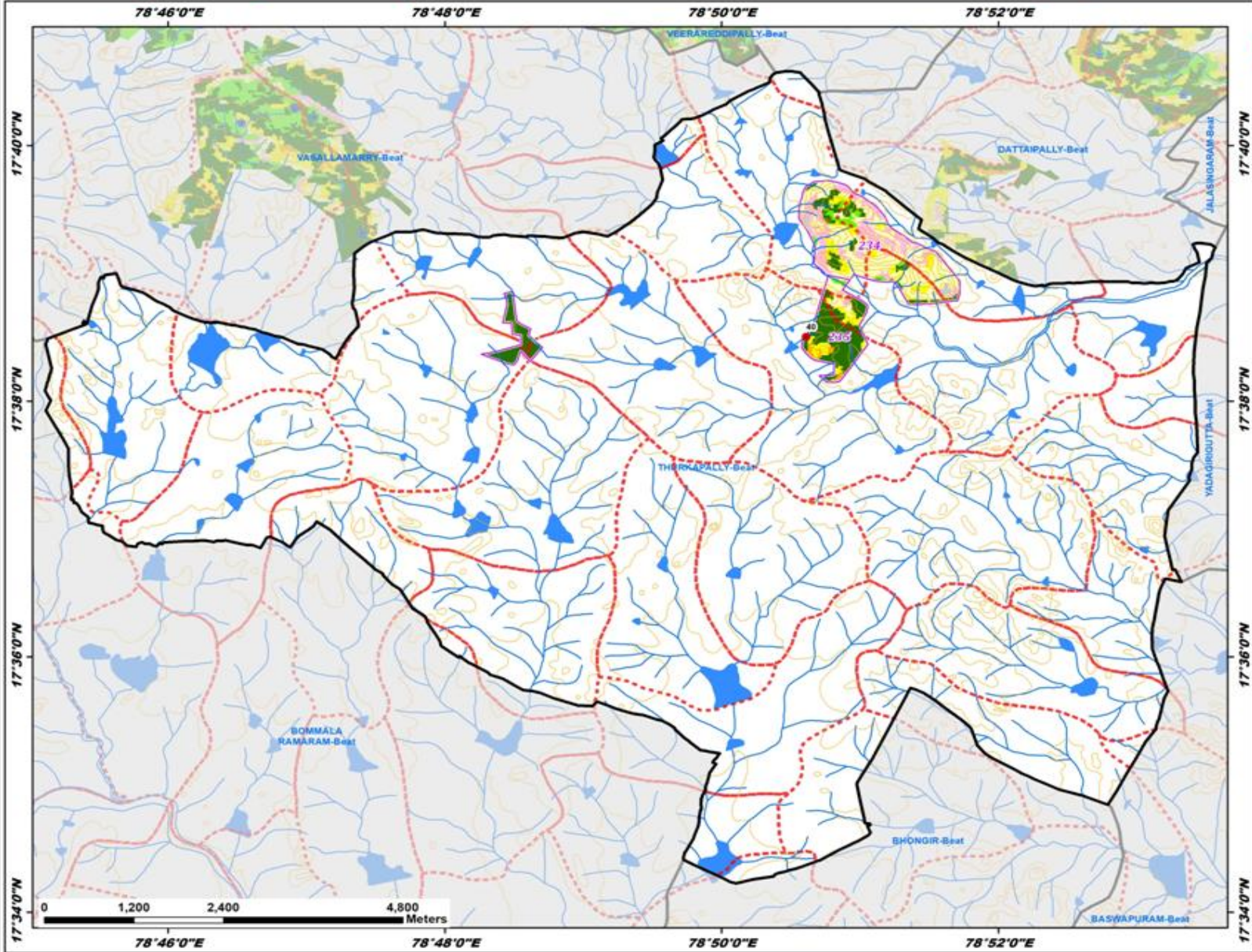
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Thurkapally Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



ID	Latitude	Longitude	Catchment Area_Ha	Priority
40	17.641725	78.843539	9.99	I

Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- - - Watershed Boundary
- ▭ Compartment Boundary
- ▭ Beat Boundary
- - - Division Boundary

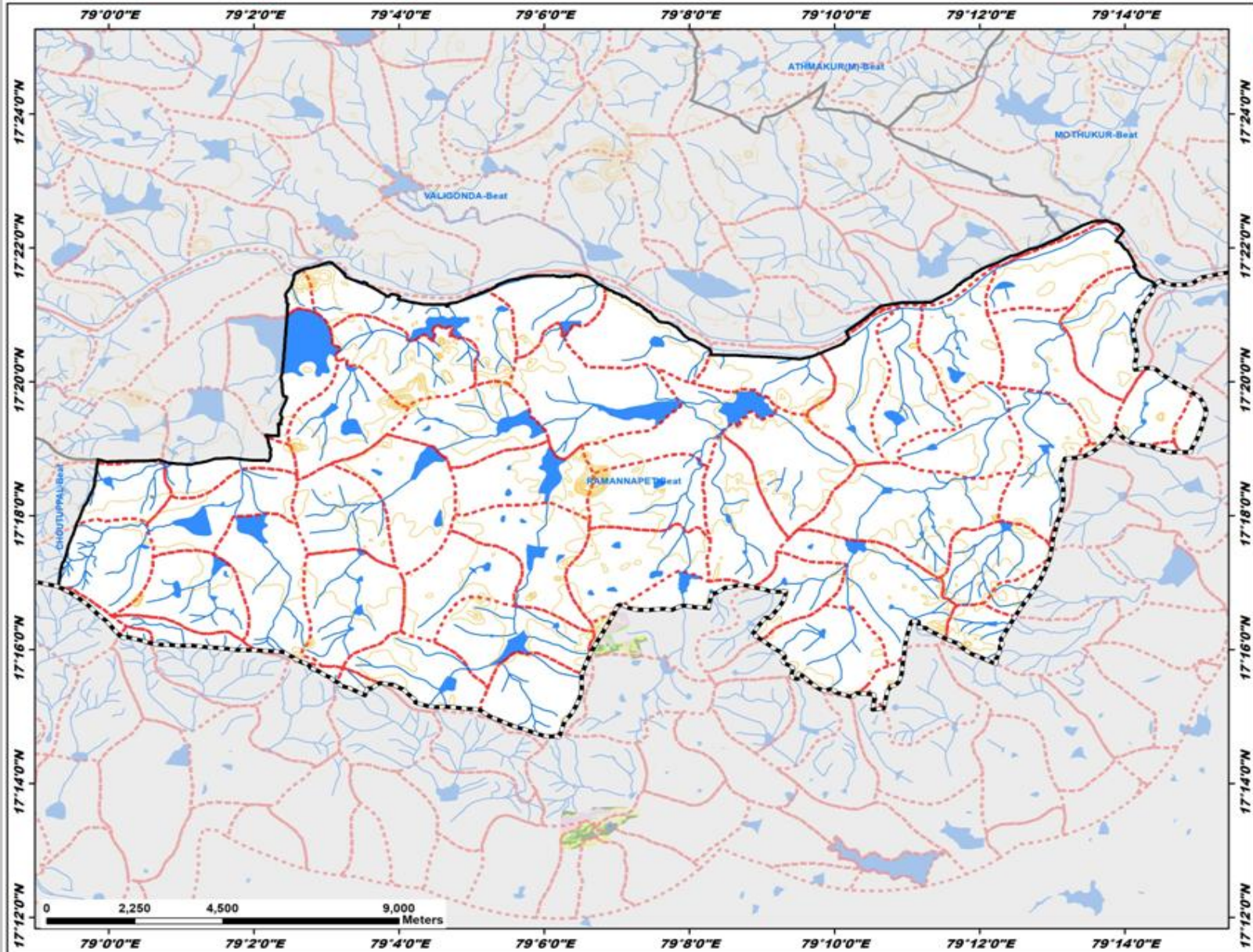
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Ramannapet Beat



Division : Yadadri Bhuvanagiri
Range : Choutuppal



Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

Suitability Index

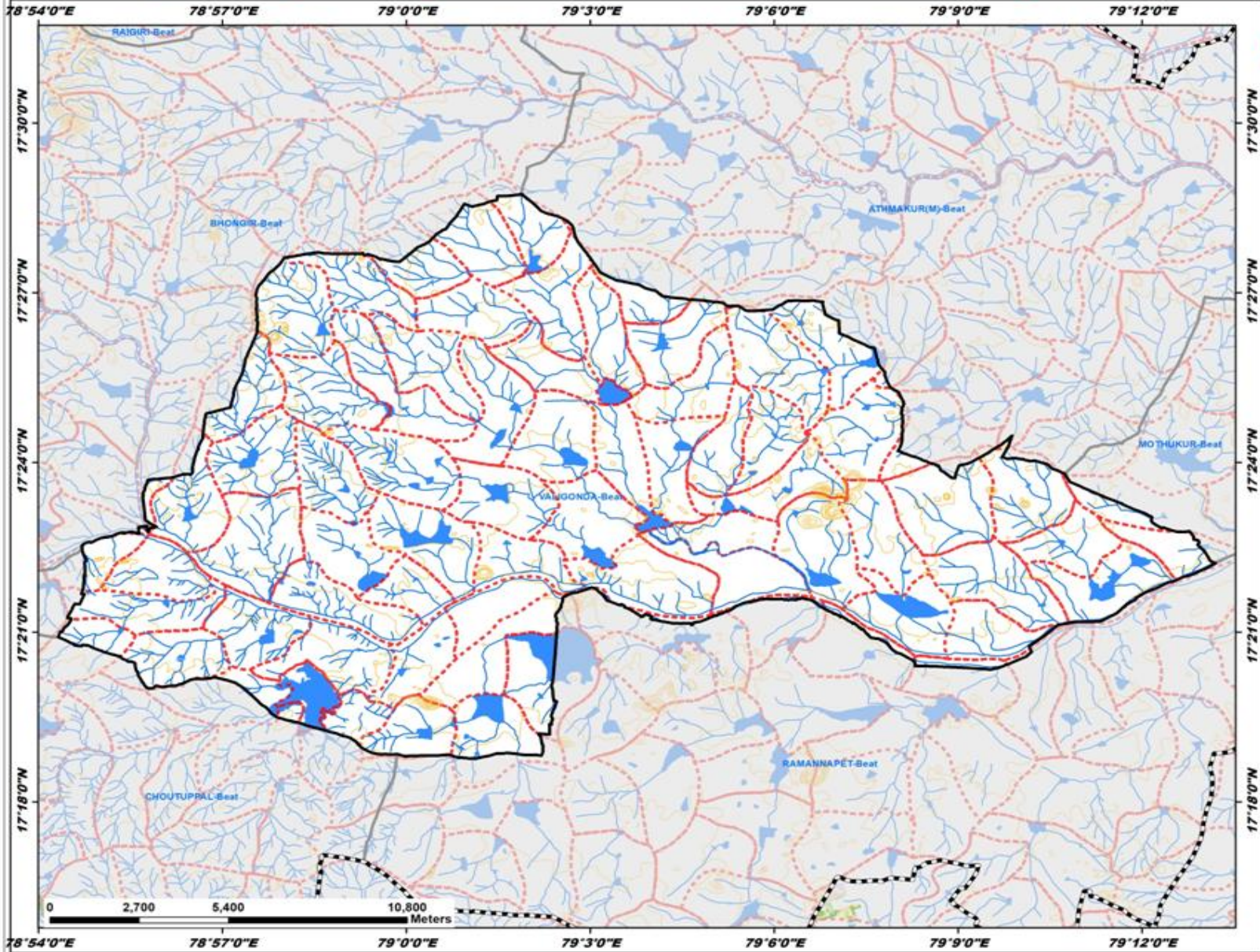
- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body



Map Showing Suitability index for Construction of SMC Works of Valigonda Beat



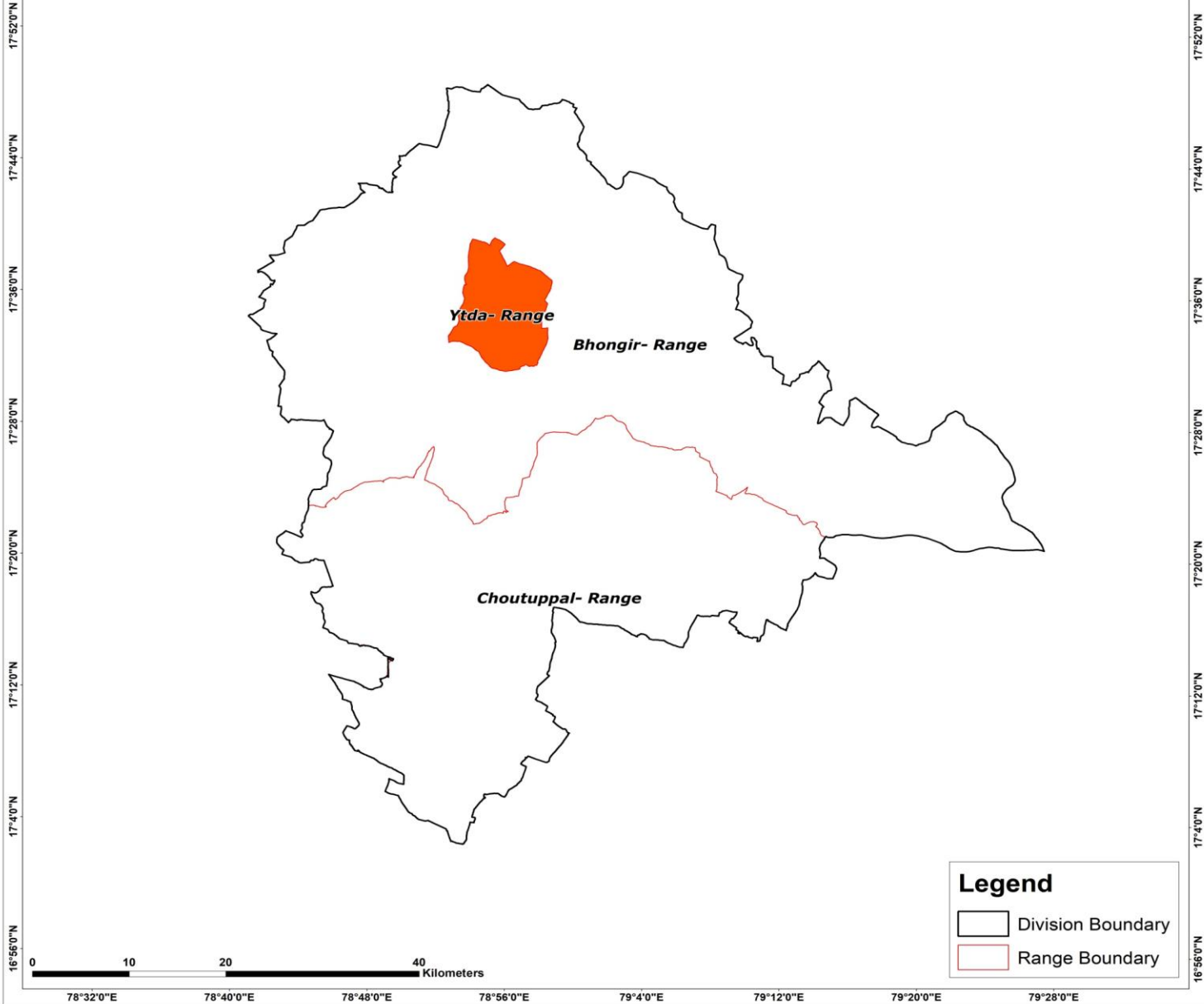
Division : Yadadri Bhuvanagiri
Range : Choutuppal



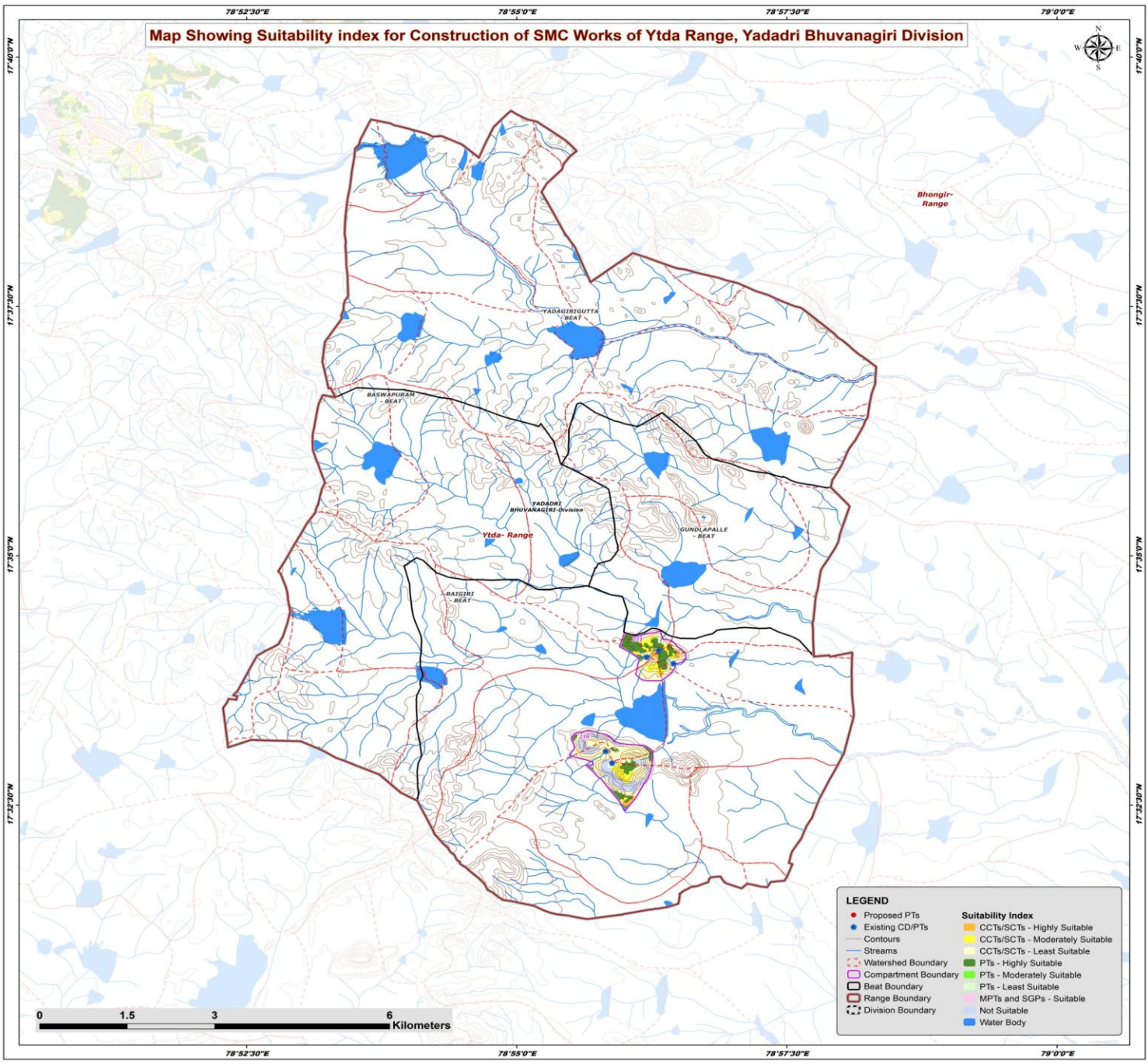
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - - - Watershed Boundary
 - - - Compartment Boundary
 - ▭ Beat Boundary
 - - - Division Boundary
- ### Suitability Index
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGPs - Suitable
 - Not Suitable
 - Water Body

Map Showing YTDA Range in Yadadri Bhuvanagiri Division



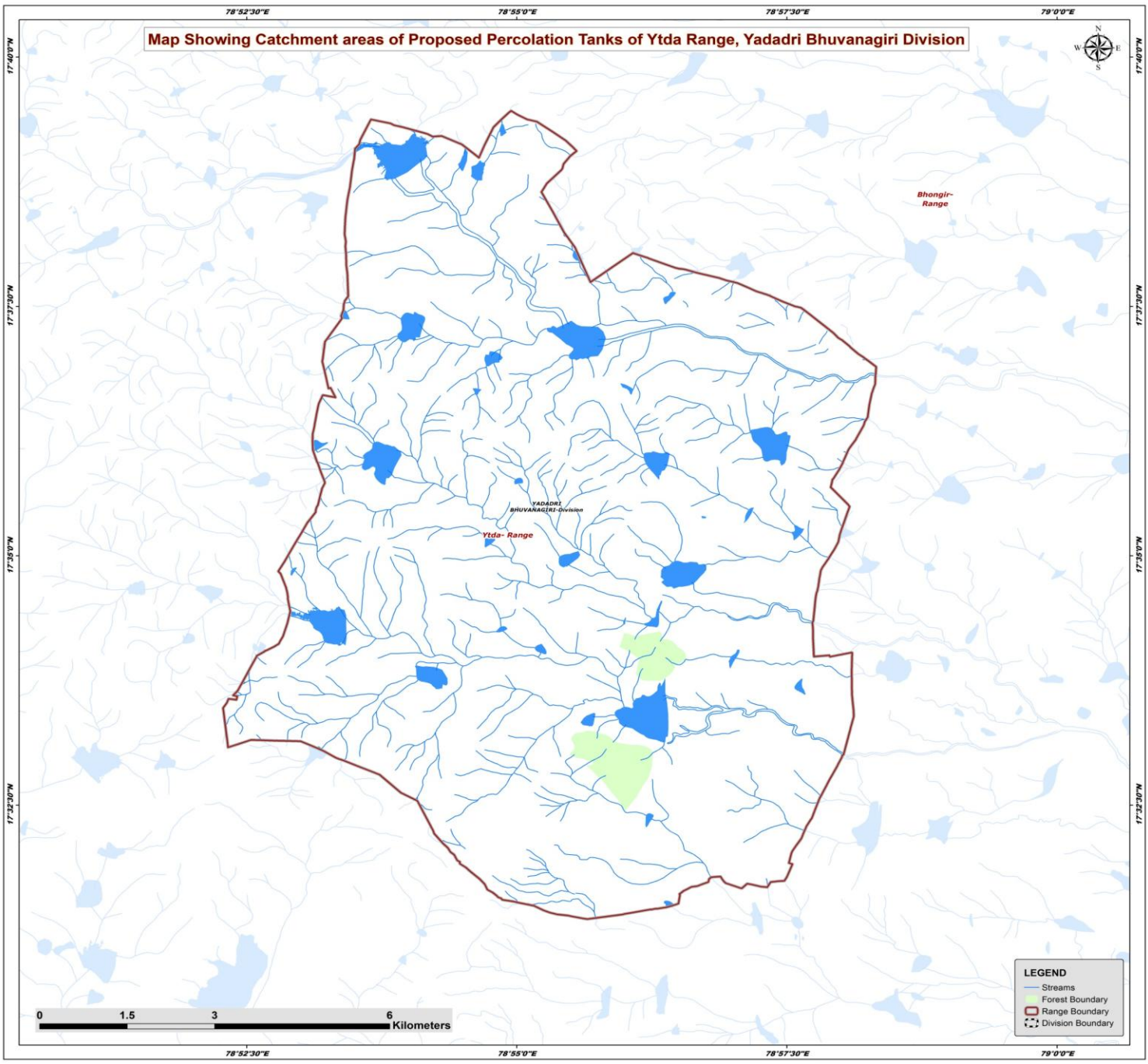
Map Showing Suitability index for Construction of SMC Works of Ytda Range, Yadadri Bhuvanagiri Division



LEGEND	
●	Proposed PTs
●	Existing CD/PTs
—	Contours
—	Streams
- - -	Watershed Boundary
□	Compartment Boundary
□	Beat Boundary
□	Range Boundary
- - -	Division Boundary
■	CCTs/SCTs - Highly Suitable
■	CCTs/SCTs - Moderately Suitable
■	CCTs/SCTs - Least Suitable
■	PTs - Highly Suitable
■	PTs - Moderately Suitable
■	PTs - Least Suitable
■	MPTs and SGPs - Suitable
■	Not Suitable
■	Water Body

0 1.5 3 6 Kilometers

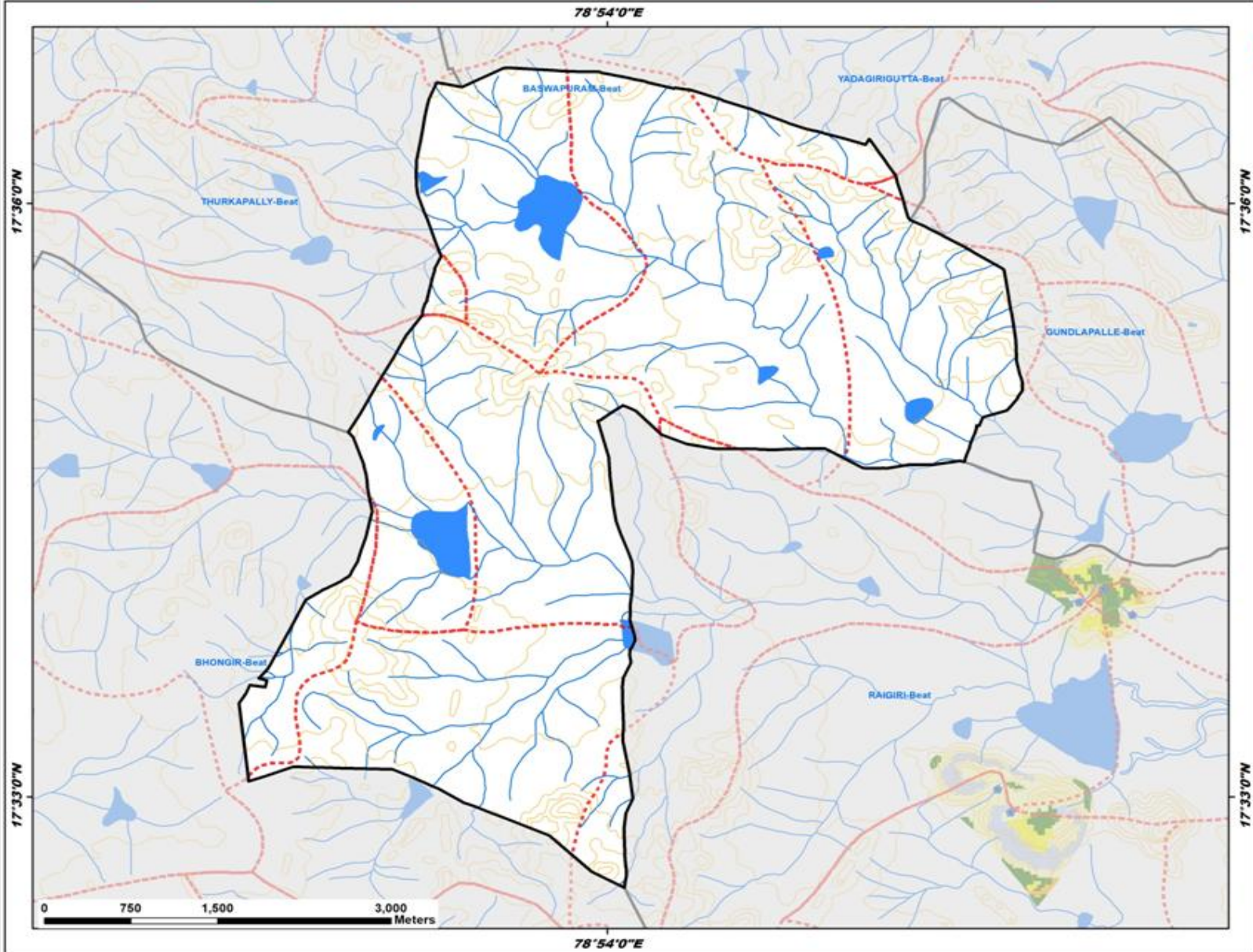
Map Showing Catchment areas of Proposed Percolation Tanks of Ytda Range, Yadadri Bhuvanagiri Division



Map Showing Suitability index for Construction of SMC Works of Baswapuram Beat



Division : Yadadri Bhuvanagiri
Range : YTDA



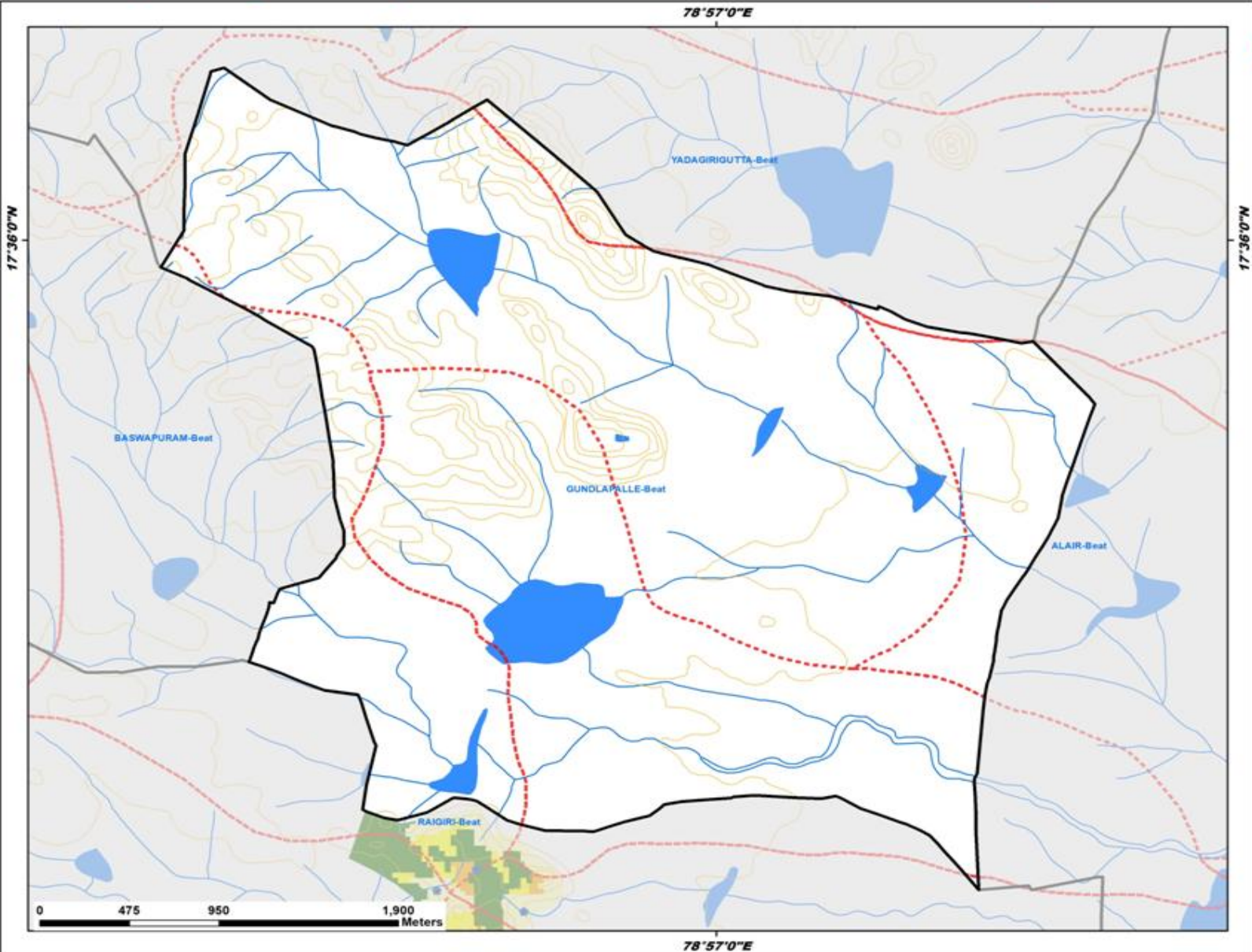
Legend

- Proposed_PTs
 - Existing CD/PTs
 - Contours
 - Streams
 - Watershed Boundary
 - Compartment Boundary
 - Beat Boundary
 - Division Boundary
- Suitability Index**
- CCTs/SCTs - Highly Suitable
 - CCTs/SCTs - Moderately Suitable
 - CCTs/SCTs - Least Suitable
 - PTs - Highly Suitable
 - PTs - Moderately Suitable
 - PTs - Least Suitable
 - MPTs and SGPs - Suitable
 - Not Suitable
 - Water Body

Map Showing Suitability index for Construction of SMC Works of Gundlapalle Beat



Division : Yadadri Bhuvanagiri
Range : YTDA



Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

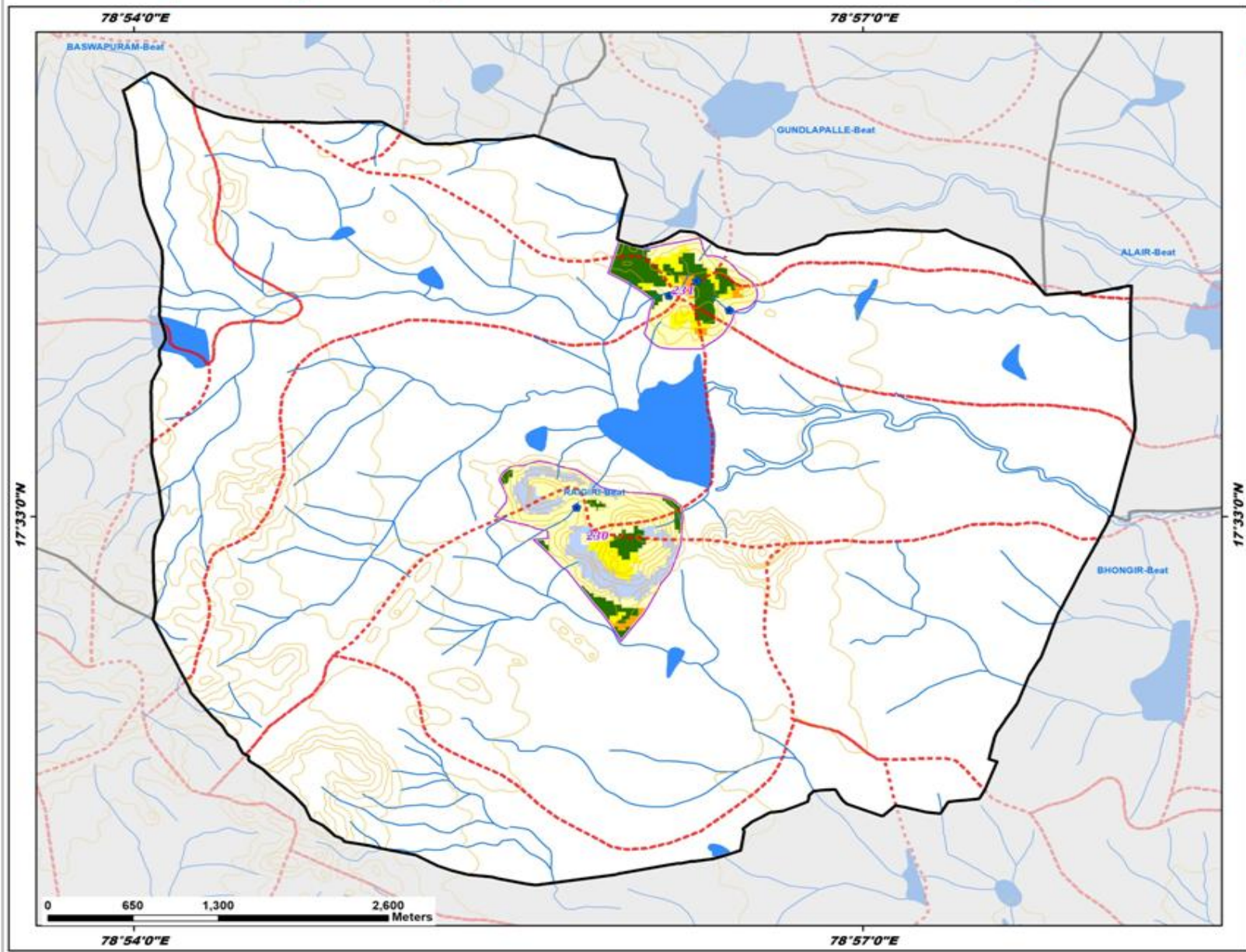
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Raigiri Beat



Division : Yadadri Bhuvanagiri
Range : YTDA



Legend

- Proposed_PTs
- Existing CD/PTs
- Contours
- Streams
- - - Watershed Boundary
- Compartment Boundary
- Beat Boundary
- Division Boundary

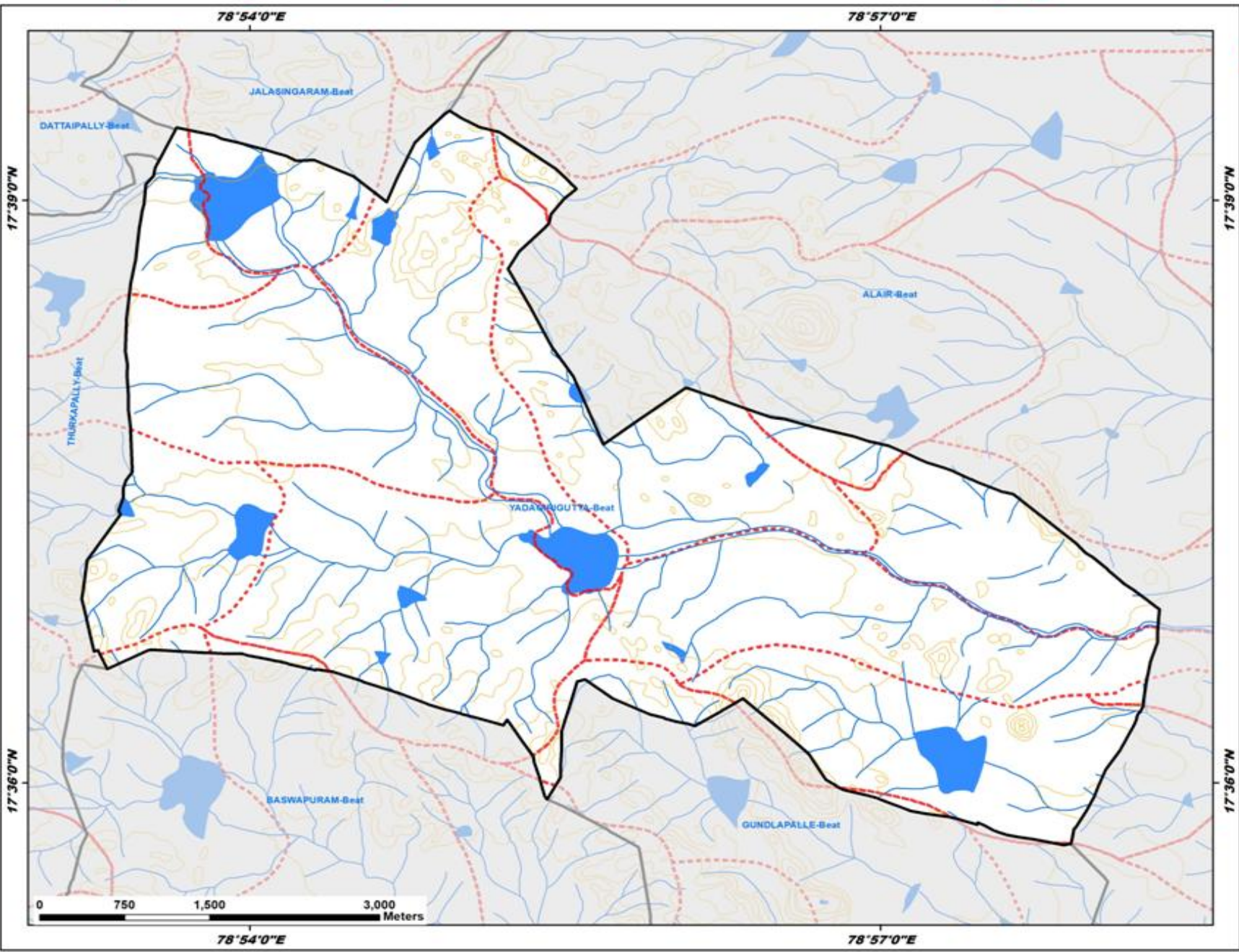
Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body

Map Showing Suitability index for Construction of SMC Works of Yadagirigutta Beat



Division : Yadadri Bhuvanagiri
Range : YTDA



Legend

- Proposed_PTs
- ★ Existing CD/PTs
- Contours
- Streams
- - - Watershed Boundary
- Compartment Boundary
- ▭ Beat Boundary
- ▭ Division Boundary

Suitability Index

- CCTs/SCTs - Highly Suitable
- CCTs/SCTs - Moderately Suitable
- CCTs/SCTs - Least Suitable
- PTs - Highly Suitable
- PTs - Moderately Suitable
- PTs - Least Suitable
- MPTs and SGPs - Suitable
- Not Suitable
- Water Body