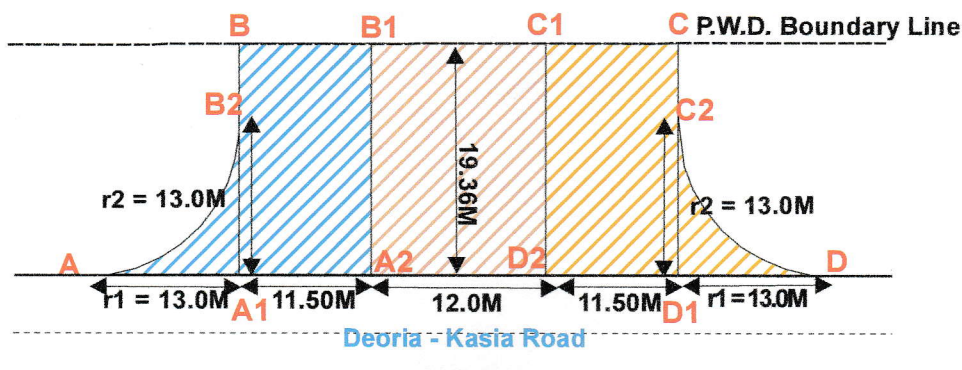


Area Calculation Sheet as per Approved Layout Plan

PROPOSED PROTECTED FOREST LAND TO BE DIVERTED FOR ENTRY/EXIT APPROACH TO BPCL RETAIL OUTLET ON DEORIA - KASIA ROAD (SH-79) IN KM NO. 19 (CH. NO. 18.620 RHS), AT GATA NO. – 166, VILLAGE:- SIRSIA PATTI HUSEN, TEHSIL:- DEORIA, DISTRICT:- DEORIA (U.P.)



Area of Entry approach to retail outlet

= Area of Curve Polygon(A B2 A1) + Area of rectangle (B B1 A2 A1)

Area of Curve Polygon(A B2 A1)

$$= \{ (r_1 \times r_2) - (\pi \times r_1 \times r_2) / 4 \}$$

$$= \{ (13.0\text{m} \times 13.0\text{m}) - (3.14 \times 13.0 \times 13.0 / 4) \}$$

$$= (169.0 - 132.665) \text{ SqM}$$

$$= 36.34 \text{ SqM}$$

Area of rectangle (B B1 A2 A1)

$$= \{ \text{Length(m)} \times \text{width(m)} \}$$

$$= (11.50\text{m} \times 19.36\text{m})$$

$$= 222.64 \text{ SqM}$$

So, Area of Entry approach to retail outlet = (36.34 + 222.64) SqM = 258.98 SqM

Area of Separator = Area of rectangle (B1 C1 D2 A2)

Area of rectangle (B1 C1 D2 A2)

$$= \{ \text{Length(m)} \times \text{width(m)} \}$$

$$= (12.0\text{m} \times 19.36\text{m}) \text{ SqM}$$

$$= 232.32 \text{ SqM}$$

Area of Exit approach from retail outlet

= Area of Curve Polygon(C2 D D1) + Area of rectangle (C C1 D2 D1)

Area of Curve Polygon(C2 D D1)

$$= \{ (r_1 \times r_2) - (\pi \times r_1 \times r_2) / 4 \}$$

$$= \{ (13.0\text{m} \times 13.0\text{m}) - (3.14 \times 13.0 \times 13.0 / 4) \}$$

$$= (169.0 - 132.665) \text{ SqM}$$

$$= 36.34 \text{ SqM}$$

Area of rectangle (C C1 D2 D1)

$$= \{ \text{Length(m)} \times \text{width(m)} \}$$

$$= (11.50\text{m} \times 19.36\text{m})$$

$$= 222.64 \text{ SqM}$$

So, Area of Exit approach from retail outlet = (36.34 + 222.64) SqM = 258.98 SqM

Total Proposed Protected Forest Area for Diversion

$$= 258.98 \text{ SqM (Entry)} + 232.32 \text{ SqM (Forest Area B/W Entry \& Exit)} + 258.98 \text{ SqM (Exit)}$$

$$= 750.28 \text{ Sqm} = 0.075028 \text{ Ha.}$$

Non-Forest Land/Private Land Area as per Layout Plan

= Private Land area = area of parallelogram BCHI =

$$= \text{base (m)} \times \text{height (m)} = (35.0\text{m} \times 35.0\text{m}) = 1225.0 \text{ SqM} = 0.1225 \text{ Ha.}$$

Pranod

PRANOD KUMAR

TERRITORY ENGINEER

08/10/20

Vikas Srivastava
Bharat Petroleum Corporation Ltd.

[Signature]
Constituted Attorney
(Authorized Signatory)

**Bharat Petroleum Corporation Ltd.
Gorakhpur Territory**