



HANSLAB (PTY) Ltd
ENVIRONMENTAL AND GROUND
ENGINEERING SPECIALIST

SITE INVESTIGATION REPORT:

**NEW L1292 LOW-LEVEL VEHICLE BRIDGE (3886)
OVER THE CWEMBE RIVER ON L1292**



PREPARED ON BEHALF OF:



DEPARTMENT OF TRANSPORT

PROJECT:

Construction of a new low-level vehicle bridge on L1292

AREA/MUNICIPALITY:

Alfred Duma Local Municipality

CLIENT/APPLICANT:

KZN Department of Transport

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L1292 LOW-LEVEL VEHICLE RIVER BRIDGE

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1. PROJECT TITLE

The proposed construction of the L1292 low-level vehicle bridge, in Estcourt, within the Alfred Duma Local Municipality.

2. PROJECT DESCRIPTION

The KZN Department of Transport (Applicant) proposes to construct a single lane low-level vehicle river bridge at the crossing point between the Cwembe River and the Local Road L1292, within the Alfred Duma Local Municipality, KwaZulu-Natal. The design specifications for the proposed structure include: a vehicle lane (minimum of 4.15m wide) lined with standard bollards as barriers, and the pedestrian walkway, the total width of the bridge = **5.8m**, total length is = **30m**, the height (to the underside of the deck from the river bed) approximately = **2.73m**, **3 no. piers 0.6m wide**, **2 abutments**, **4 no. spans of 9m** each to give an opening width of **6.68m**, deck is raised **3.38m** above the river bed and will accommodate a 1:10 year flood event, and the proposed structure will be doweled **1500mm into the rock layer**. The proposed project triggers *listed activities of the EIA Regulations of 2014, specifically Activity 12 & 19*, and forms the focus of this application.

3. LISTED ACTIVITIES

The listed activities below are triggered as per EIA Regulations of 2014:

- Listing Notice 1, Listed Activity 12

The development of –

(ii) infrastructure or structures with a physical footprint of 100 square meters or more; where such development occurs—

(a) within a watercourse

excluding—

(dd) where such development occurs within an urban area;

- Description of the activity that triggers Activity 12:

The proposed structure traverses a watercourse (Cwembe River). Therefore, the applicant proposes to construct a low-level vehicle river bridge, and the physical footprint of the proposed structure will be

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greater than 100 square meters which therefore triggers this activity. Furthermore, the development will take place in a rural area.

- Listing Notice 1, Listed Activity 19

The infilling or depositing of any material of more than 10 cubic metres into, or the dredging, excavation, removal or moving of soil, sand, shells, shell grit, pebbles or rock of more than 10 cubic metres from [—(i)] a watercourse;

but excluding where such infilling, depositing, dredging, excavation, removal or moving—

a) will occur behind a development setback;

b) is for maintenance purposes undertaken in accordance with a maintenance management plan; [or]

c) falls within the ambit of activity 21 in this Notice, in which case that activity applies;

d) occurs within existing ports or harbours that will not increase the development footprint of the port or harbour;

e) or where such development is related to the development of a port or harbour, in which case activity 26 in Listing Notice 2 of 2014 applies.

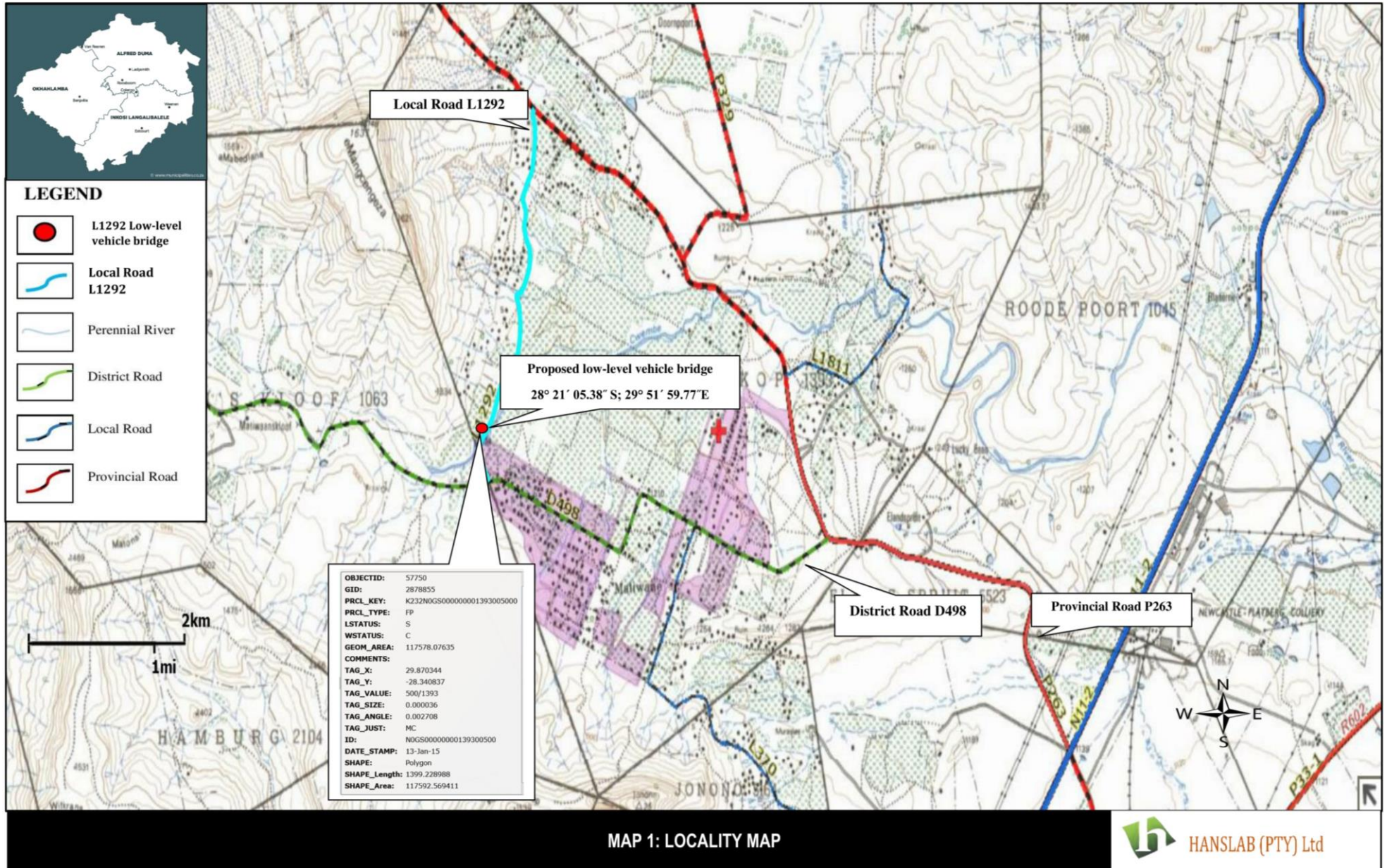
- Description of the activity that triggers Activity 19:

The proposed project will require the removal of **more than 10 cubic meters** of soil to be removed from the watercourse, and therefore triggers *Activity 19*. The proposed activity will take place in a rural area with no development setback, is not for maintenance purposes, does not fall within the ambit of activity 21 in Listing Notice 1, there are no exiting ports or harbours within the proposed site.

4. COORDINATES RELATED TO THE PROPOSED ACTIVITY

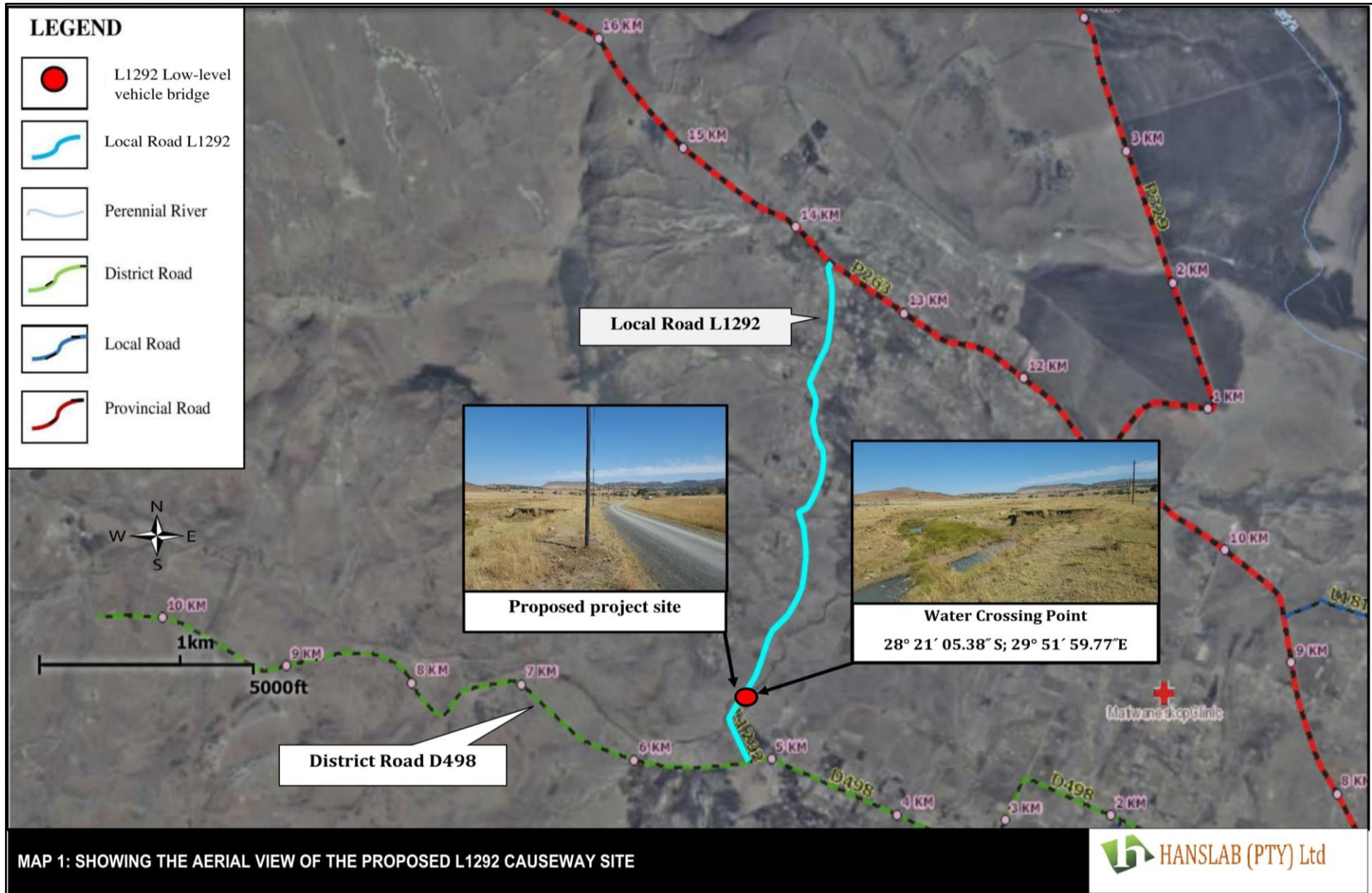
LOW-LEVEL BRIDGE	LATITUDE (S)	LONGITUDE (E)
Abutment 1	28°21'2.65"S	29°52'4.07"E
Abutment 2	28°21'1.49"S	29°52'3.89"E

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Map 1: The location of the proposed site.

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Map 2: Showing an aerial view of the proposed site.