

REPORT ON GEO-PHYSICAL ELECTRICAL  
LOGGING OF BOREHOLE

at  
Village : Hawal  
Daulana, Hapur, Uttar Pradesh.

For  
State Water Sanitation Mission (Jal Jeevan Mission)  
UP Jal Nigam(Rural), Hapur, U.P

*Submitted Through*

*M/s. L.C. Infra Projects Private Limited*



GLOBAL GROUND WATER CONSULTANTS  
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Date: 16<sup>th</sup> September 2023

## REPORT ON GEO-PHYSICAL RESISTIVITY LOGGING OF BOREHOLE

At  
**Village: Hawal**  
Daulana, Hapur, Uttar Pradesh

**Introduction:**

A deep borehole 145 (476 Feet) was drilled *M/s. L.C Infra Projects Private Limited, Hapur, U.P.*, as a part of their scope of work of development of tubewell under Jal Jeevan Mission project of SWSM, GGWC conducted a Geophysical Resistivity logging in the above bore hole using IGIS's Logger dated on 16<sup>th</sup> September 2023.

Based on the interpretation of the Logging, the following litho logy has been inferred which tallies fairly well with the well-site litho-log based on mud-wash samples.

<i>Depth in m</i>	<i>Expected Litholog</i>	<i>Expected Quality</i>
0 - 3	Surface Soil	
3 - 10	Clay	
10 - 19	Sandy clay	
19 - 22	Clay	
22 - 27*	Fine sand	Good
27 - 36*	Medium to fine sand	Good
36 - 39	Sandy clay	
39 - 77*	Medium sand	Good
77 - 88	Clay	
88 - 95*	Medium sand	Good
95 - 115	Clay kankar	
115 - 121*	Fine sand	Good
121 - 145	Clay kankar	

*Conclusions and Recommendations:*

1. The litholog inferred broadly tallies with that of the well-site litholog.
2. The zones marked with asterisk (\*) appear to be Aquifer Zones for possible development of tubewell.
3. As per thickness of the Aquifer the expected discharge is 60,000 LPH to 70,000 LPH.
4. Water Level is 9 m below ground level.
5. The Quality of water is good. However, it is recommended to have a chemical and bacteriological analysis of the water sample before using it for human consumption or for any other use.
6. The shallow aquifers are also recommended for development to get good quantity of water.
7. *All projections and recommendations are subject to the inherent limitations of the technique employed and there could be variations as the underground conditions are not always amenable to physical interpretations.*

*For Global Groundwater Consultants*



A handwritten signature in blue ink, appearing to be "K. Singh".

*Chief Executive*

### SP and Resistivity Curves

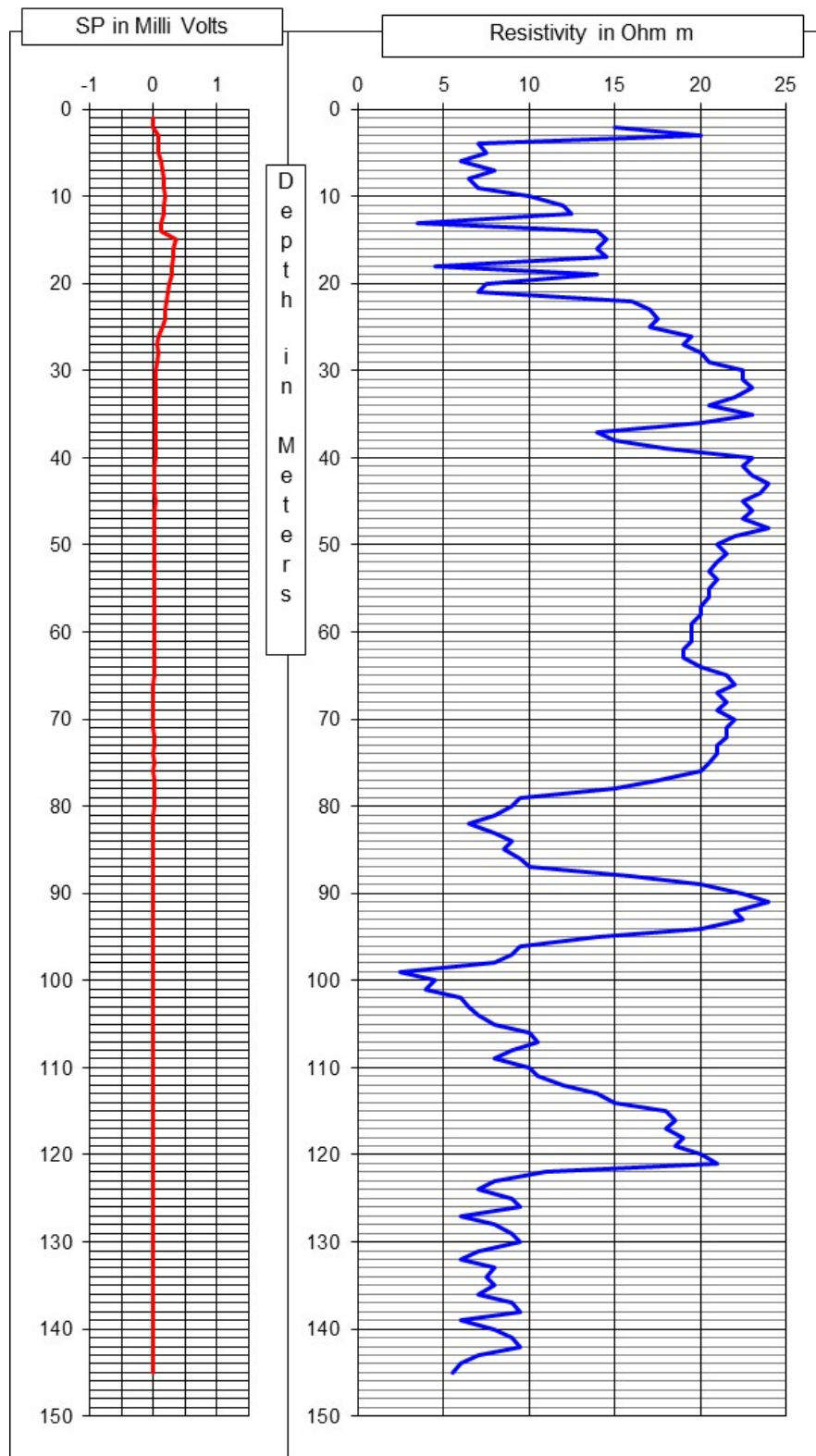




Photo of the Site at the time of Logging