

REPORT ON GEO-PHYSICAL ELECTRICAL  
LOGGING OF BOREHOLE

at  
Village: Ahammadpur Ghatina  
Bhagpat, Uttar Pradesh

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

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



**GLOBAL GROUND WATER CONSULTANTS**  
(Consulting Geologists & Geophysicists)  
84- III Floor, Humayun pur, Safdarjung Enclave, New Delhi - 110 029  
Phone: **9818-888824; 9818-007038.**

Date : 27<sup>th</sup> January, 2023

## REPORT ON GEO-PHYSICAL RESISTIVITY LOGGING OF BOREHOLE

At

Village: Ahammadpur Ghatina  
Bhagpat, Uttar Pradesh

**Introduction:**

A deep borehole 133m (436 Feet) was drilled by working agency *M/s. L.C.Infra Projects Private Limited, Bhagpat, 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 borehole using IGIS's Logger dated on 27<sup>th</sup> January, 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 - 8	Sandy clay	
8 - 14	Fine sand	
14 - 72*	Medium sand	Good
72 - 81*	Medium to fine sand	Good
81 - 88	Sandy clay	
88 - 96*	Fine sand	Good
96 - 116	Clay with kankar	
116 - 126	Sandy clay	
126 - 133	Clay with 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 13 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.*

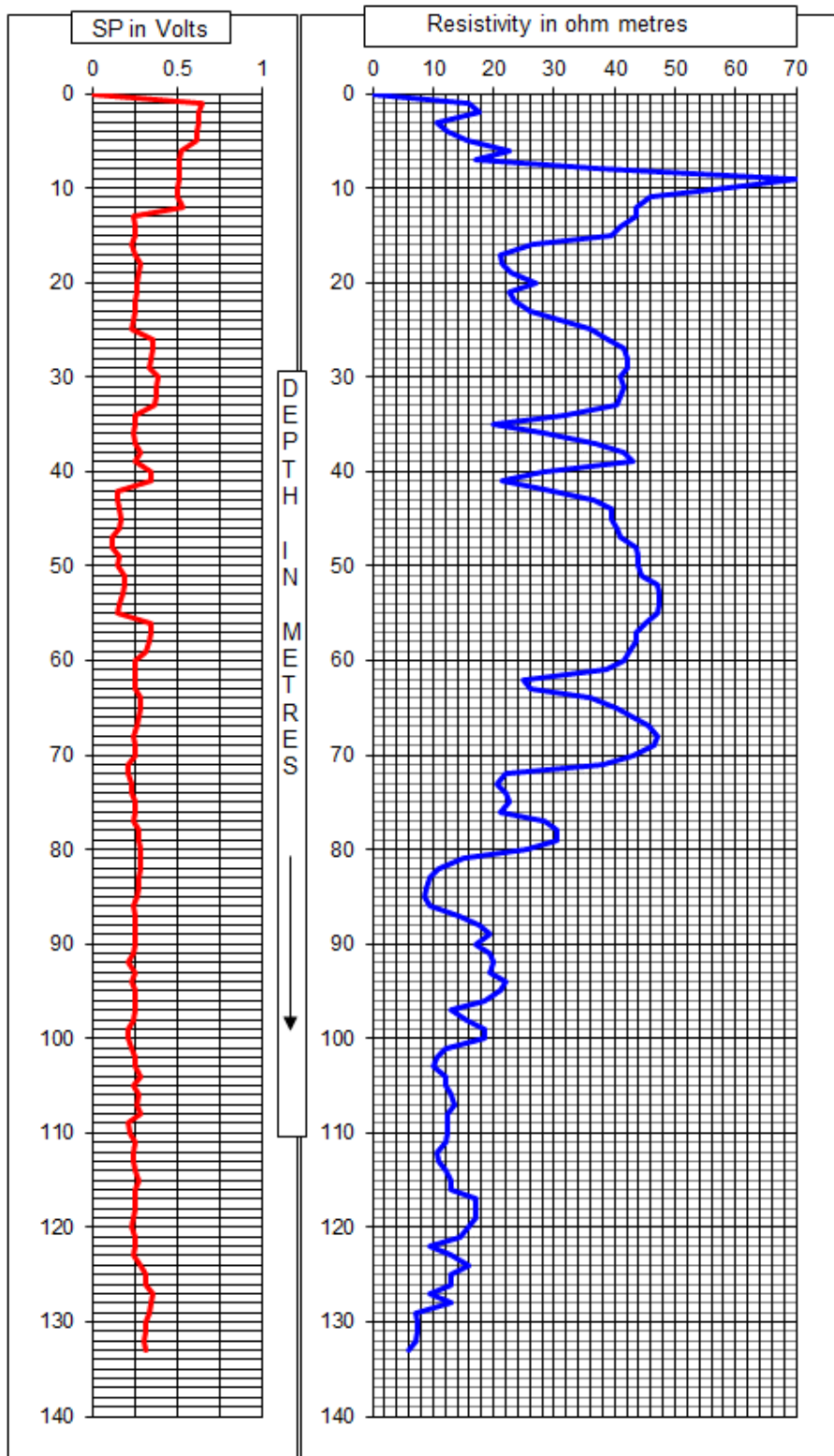
*for Global Groundwater Consultants*



*(M. RAVI KANTH)*

*M.Ravi Kanth  
Hydrogeologist*

### SP and Resistivity Curves



Village: Ahammadpur Ghatina  
Bhagpat, Uttar Pradesh



Photo of the Site at the time of Logging