### REPORT ON GEO-PHYSICAL ELECTRICAL LOGGING OF BOREHOLE

at Village: Alamgirpur Garh Mukteswar, 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 (Consulting Geologists & Geophysicists) 84- III Floor, Humayun pur, Safdarjung Enclave, New Delhi - 110 029 Phone: **9818-888824; 9818-007038**.

Date : 15<sup>th</sup> May, 2022

REPORT ON GEO-PHYSICAL RESISTIVITY LOGGING OF BOREHOLE

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#### At

## Village: Alamgirpur Garh Mukteswar, Hapur, Uttar Pradesh

#### Introduction:

A deep borehole 165m (541 Feet) was drilled by working agency *M/s*. *L.C.Infra Projects Private Limited, Ghaziabad, 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 15<sup>th</sup> May, 2022

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 mudwash samples.

Depth in m		Expected Litholog	Expected Quality
0 -	3	Surface Soil	
3 -	6	Clay	
6 -	23*	Fine sand	Good
23 -	48*	Medium sand	Good
48 -	51	Clay	
51 -	61*	Medium sand	Good
61 -	65	Clay	
65 -	90*	Medium sand	Good
90 -	95*	Fine sand	Good
95 -	106*	Medium sand	Good
106 -	109*	Fine sand	Good
109 -	134*	Medium sand	Good
134 -	152	Sandy clay	
152 -	157*	Fine sand	Good
157 -	165	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 80,000 LPH to 1,00,000 LPH.
- 4. Water Level is 6 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.

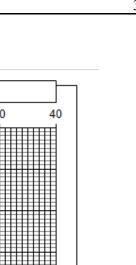
for Global Groundwater Consultants

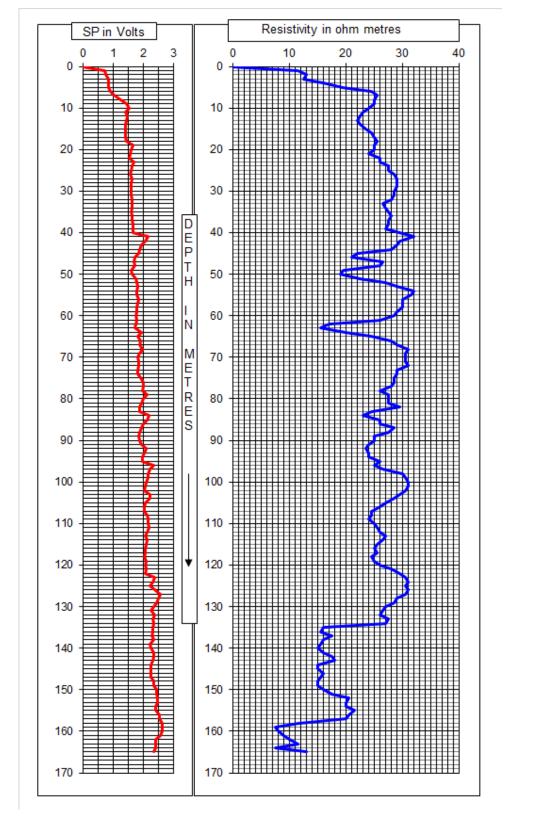


(M. RAVI KANTH)

M.Ravi Kanth *Hydrogeoloist* 

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SP and Resistivity Curves



Photo of the Site at the time of Logging

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