

# **Applications of Surveying and GIS in Utilities Field – Giza Utility Data Center**

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## **Keywords:**

## **SUMMARY**

The idea of establishing the Giza Utility Data Center was originated in order to avoid wasting public money as a result of random digging which damages underground utilities because of the lack of detection technology. GUDC started working in 25<sup>th</sup> April 2002. The usage of the survey and GIS technology is the only way to help achieving the center's performance and tasks.

## GUDC Tasks:

- Detecting all types of underground utilities by using detection's instruments and setting them out on surveying maps
- Producing cadastral & topographic maps by using the most recent international technology of survey and GIS
- Establishing data base to preserve both the surface structure and the infrastructure by using the GIS technology and producing the data in form of sheet and digital maps with several scales
- Providing the planners and decision makers in Giza governorate with accurate data about the surface structure and the infrastructure
- Following up any digging works in underground utilities and providing cadastral maps with Giza utilities on it.

## **CONTACTS**

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## Data Types

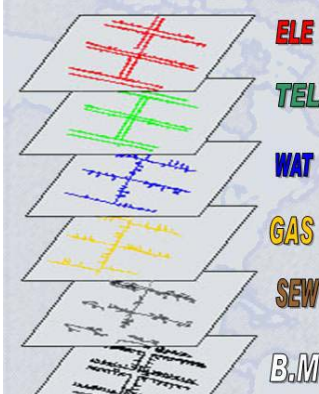


LINE	START	END	TYPE
1	940.147	957.887	3-Phase 40 GSA
2	940.147	957.887	3-Phase 40 SEU
3	1040.939	1049.548	3-Phase 30 GSA
4	1040.939	1049.548	3-Phase 30 SEU
5	958.576	955.666	2-Phase 20 SEU
6	955.277	952.876	2-Phase 20 GSA
7	955.277	952.876	2-Phase 20 SEU
8	955.277	952.876	2-Phase 20 GSA
9	955.277	952.876	2-Phase 20 SEU
10	955.277	952.876	2-Phase 20 GSA
11	955.277	952.876	2-Phase 20 SEU
12	955.277	952.876	2-Phase 20 GSA
13	955.277	952.876	2-Phase 20 SEU
14	955.277	952.876	2-Phase 20 GSA
15	955.277	952.876	2-Phase 20 SEU
16	955.277	952.876	2-Phase 20 GSA
17	955.277	952.876	2-Phase 20 SEU
18	955.277	952.876	2-Phase 20 GSA
19	955.277	952.876	2-Phase 20 SEU
20	955.277	952.876	2-Phase 20 GSA
21	955.277	952.876	2-Phase 20 SEU
22	955.277	952.876	2-Phase 20 GSA
23	955.277	952.876	2-Phase 20 SEU
24	955.277	952.876	2-Phase 20 GSA
25	955.277	952.876	2-Phase 20 SEU
26	955.277	952.876	2-Phase 20 GSA
27	955.277	952.876	2-Phase 20 SEU
28	955.277	952.876	2-Phase 20 GSA
29	955.277	952.876	2-Phase 20 SEU
30	955.277	952.876	2-Phase 20 GSA

ATTRIBUTE	VALUE	TYPE
1	30	LINE
2	40	GSA
3	30	SEU
4	20	SEU
5	30	GSA
6	20	SEU
7	30	GSA
8	20	SEU
9	30	GSA
10	20	SEU
11	30	GSA
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13	30	GSA
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16	20	SEU
17	30	GSA
18	20	SEU
19	30	GSA
20	20	SEU
21	30	GSA
22	20	SEU
23	30	GSA
24	20	SEU
25	30	GSA
26	20	SEU
27	30	GSA
28	20	SEU
29	30	GSA
30	20	SEU

**Attribute**

## USING G.I.S TECHNIQUES



**Data Manipulation**  
**BY**  
**G.I.S TECHNOLOGY**  
**HARDWARE**      **SOFTWARE**



**GIS programs**

# CONSTRUCTING GIZA DATA BASE

