Results of the BCAL GPR Survey of the Young Family Cemetery

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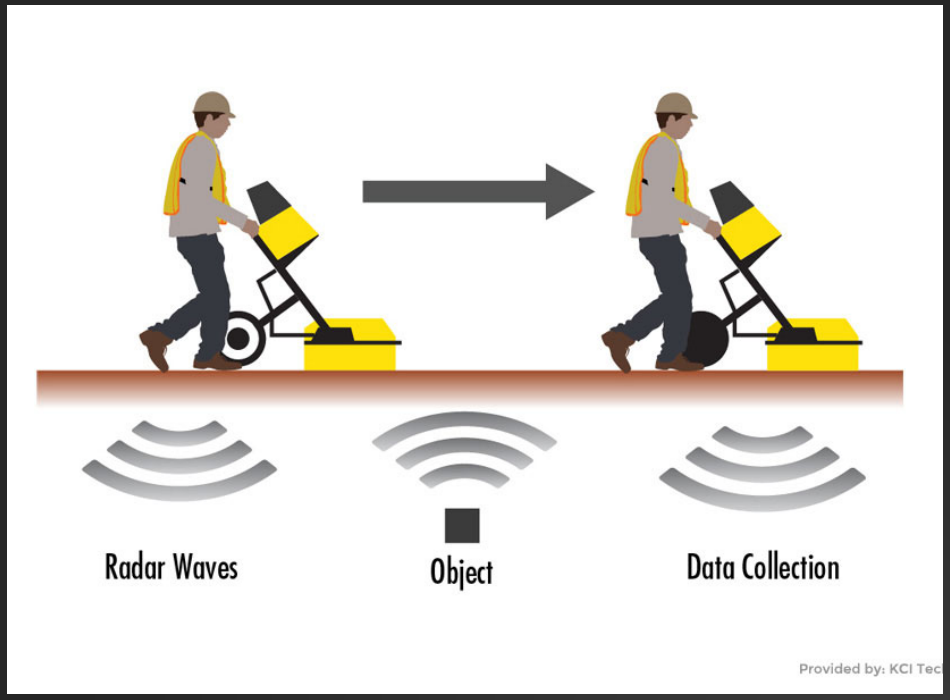
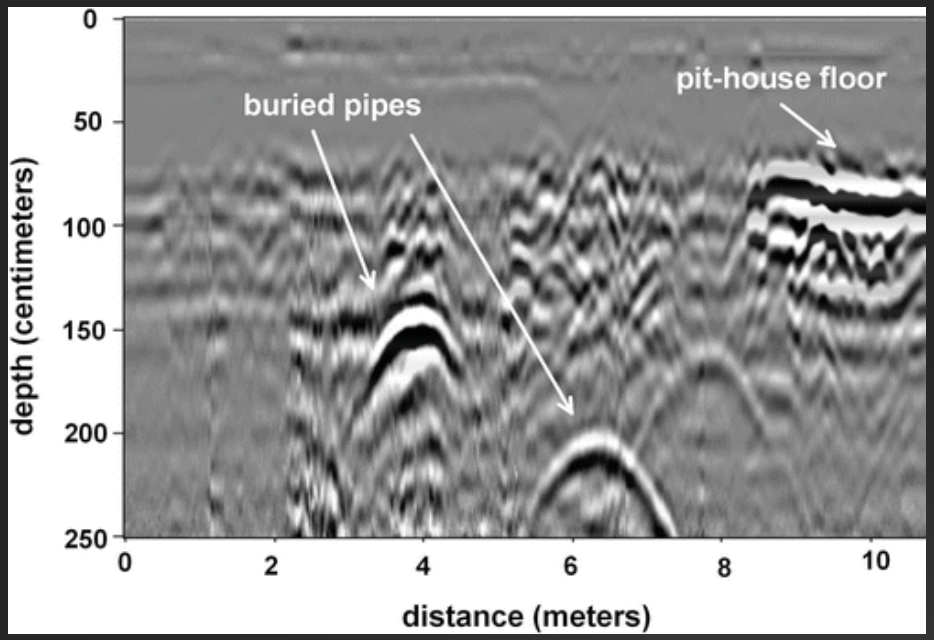
How GPR Works

- The GPR sends short, high-frequency pulses of energy into the ground and records the reflected signals.
- The strength and time it takes for the signals to return to the antenna are measured.



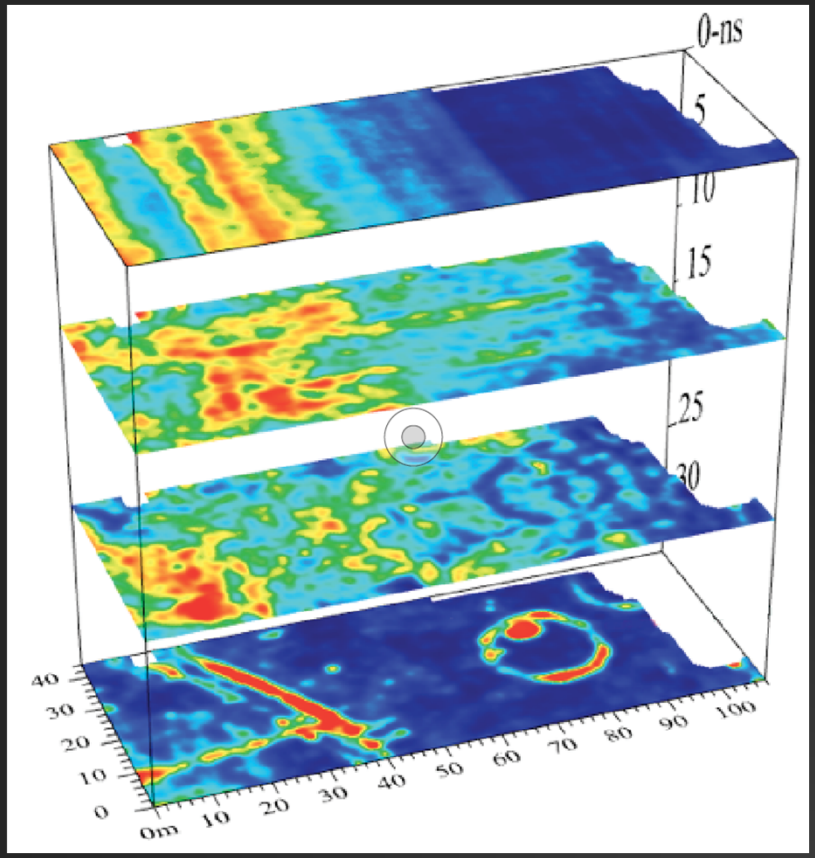
Interpreting Results

- The resulting image (radargram) shows the subsurface as a series of hyperbolas, which an experienced technician interprets to determine the type of material.



Interpreting Results

- Radargrams can be stitched together to produce a 3D representation of the surveyed area.
- Time slices of different depths can be viewed



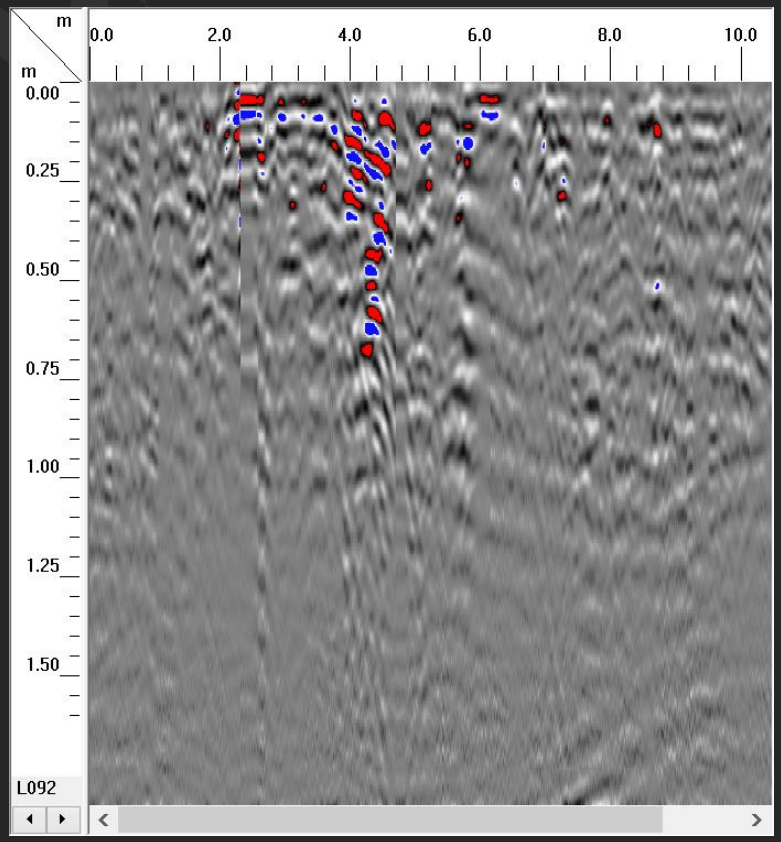
Lake Roland Methods

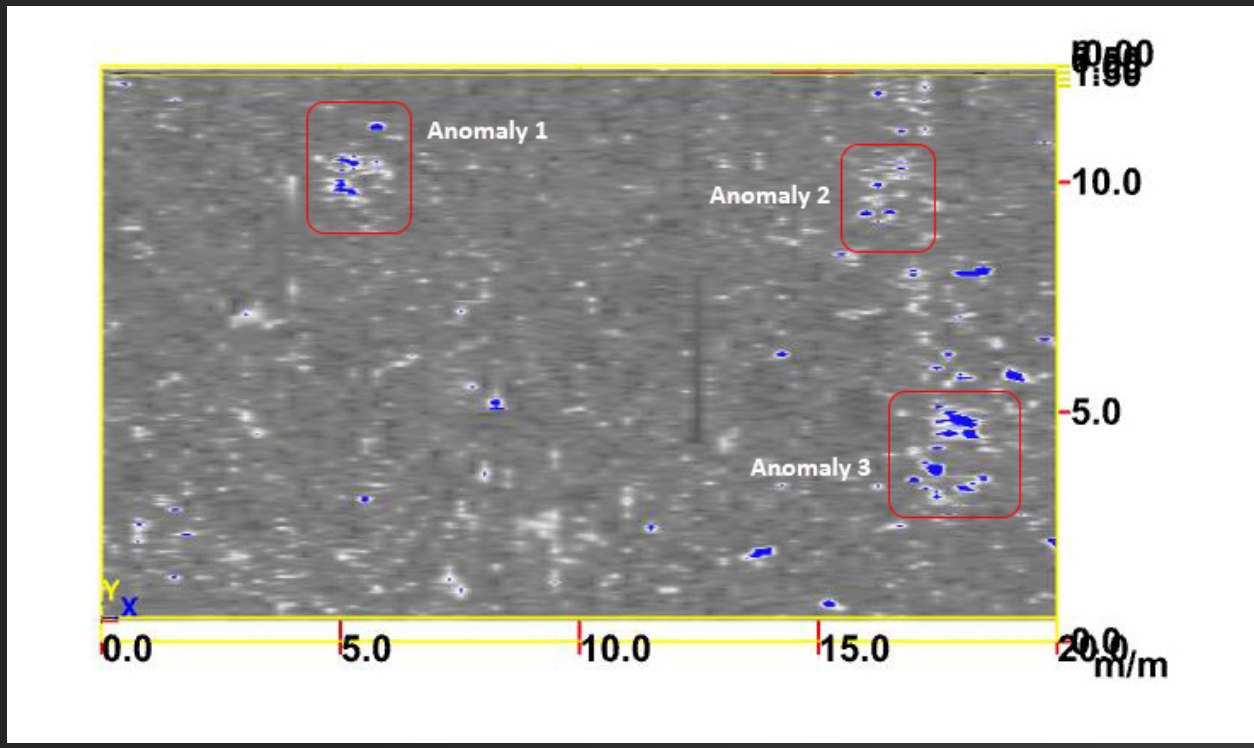
- Surface mapping of possible gravestones using a string grid and 100m tape measures
- GPR survey
  - 25 cm intervals
  - 3 m depth
- Controlled surface artifact collection

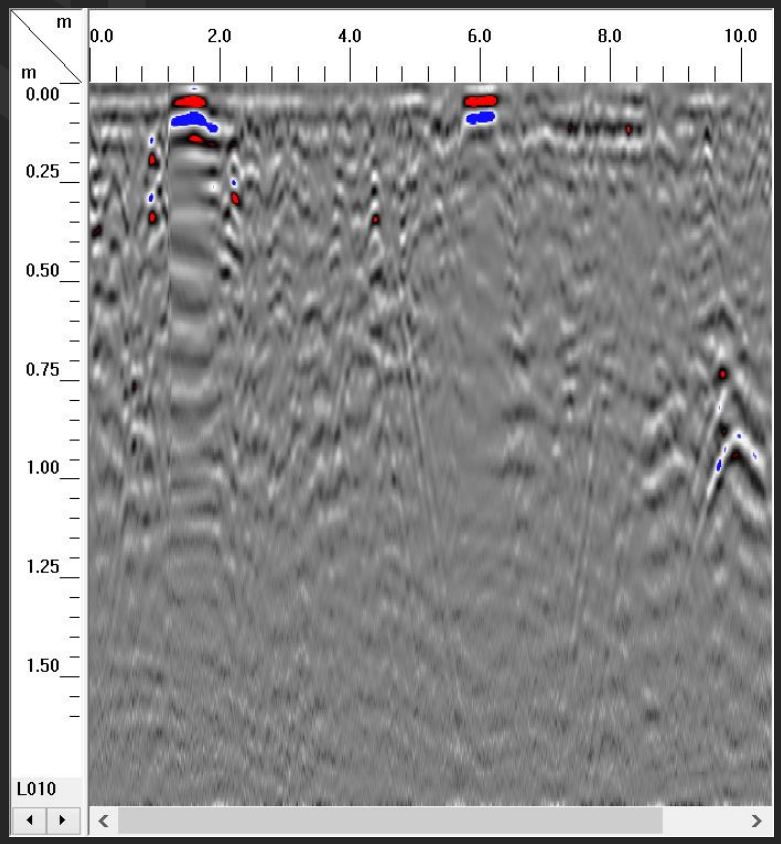
Artifact Results

- A total of 527 historic artifacts collected
  - 384 glass shards, 358 of which were container glass
  - 133 ceramic sherds
  - 10 metal objects

Type	Date(s)	Count
Whiteware	1820-2000	52
Stoneware	1740-1900	36
Creamware	1762-1820	23
Porcelain	1660+	10
Pearlware	1770-1840	8
Redware	-	2
Earthenware	-	2
Total		**133**


m
0.0
2.0
4.0
6.0
8.0
10.0
m
0.00
0.25
0.50
0.75
1.00
1.25
1.50
L092


Anomaly 1
Anomaly 2
Anomaly 3
10.0
5.0
0.0
5.0
10.0
15.0
20.0
m/m


m
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2.0
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6.0
8.0
10.0
m
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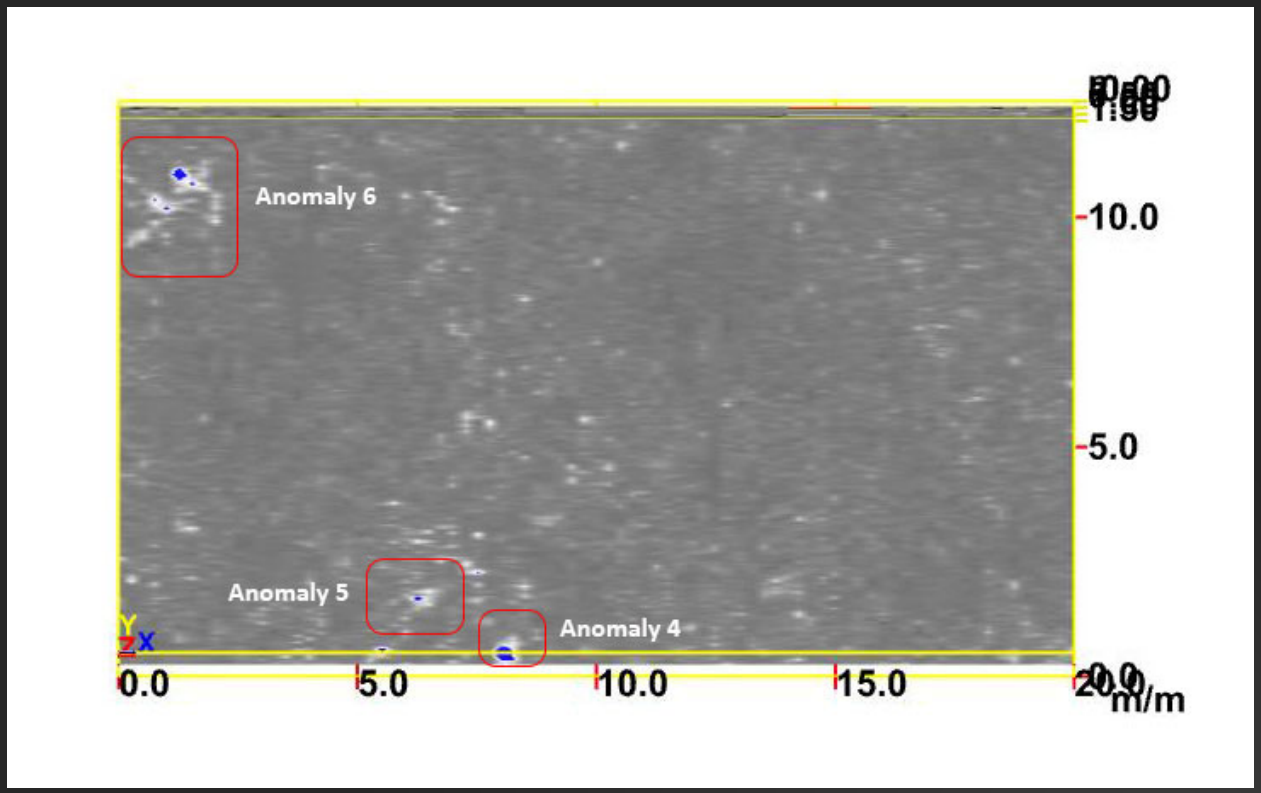
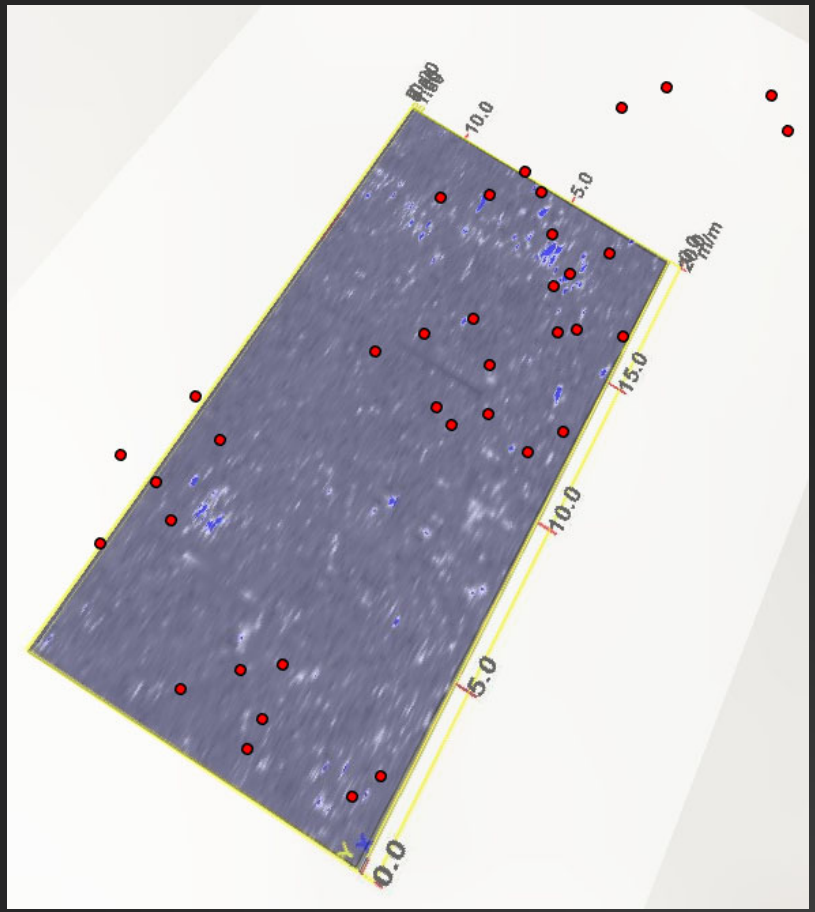
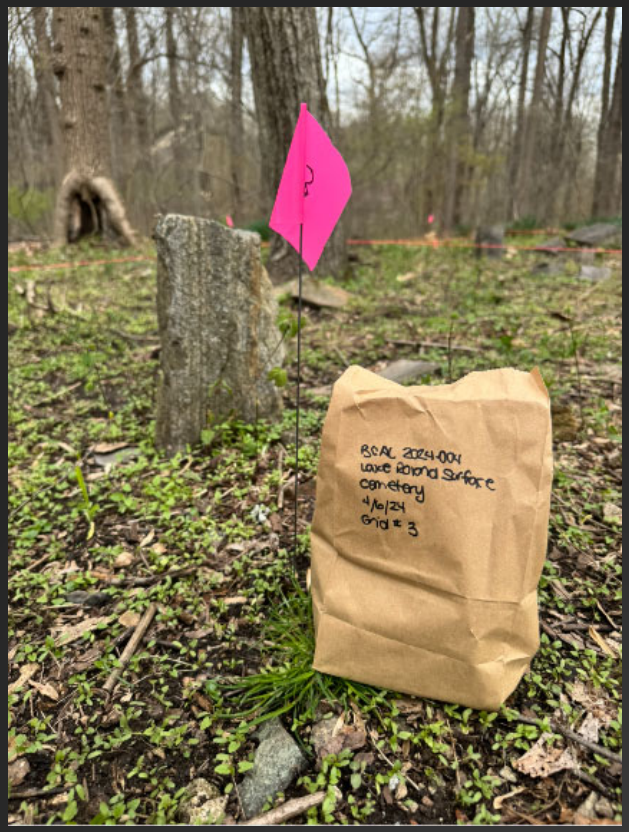
1.00
1.25
1.50
L010


Anomaly 6
Anomaly 5
Anomaly 4
10.0
5.0
0.0
0.0
5.0
10.0
15.0
20.0
m/m

GPR and Mapping Results

- 20-50 cmbs time slice



Conclusions

- GPR confirms a cemetery but cannot identify the number of burials
- A substantial proportion of the artifacts date to the 19th and 20th century occupation of the site