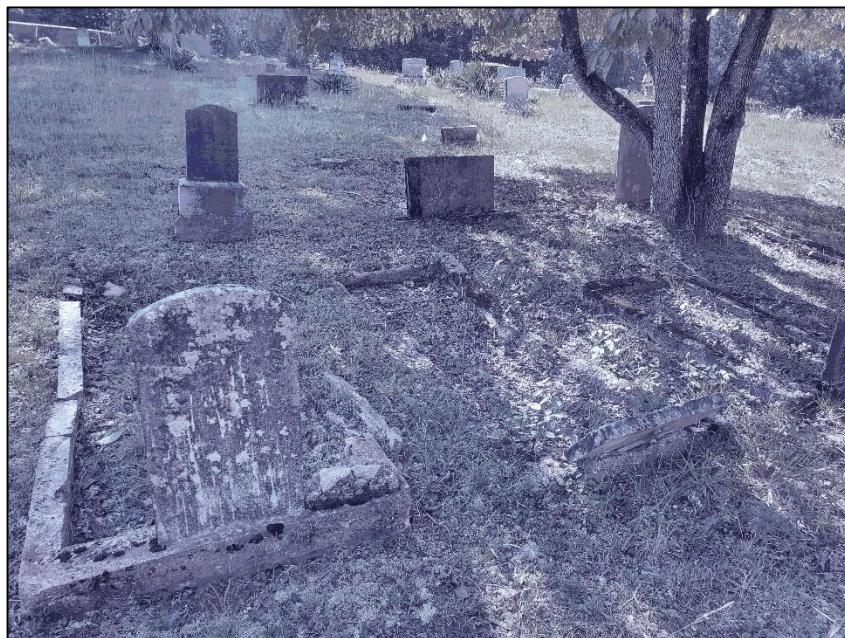


A Ground Penetrating Radar Survey of the Union Baptist Church (Shores) Cemetery

VDHR 032-5197

Fluvanna County, Virginia



Produced for the Union Baptist Church (Shores)
Produce by Rivanna Archaeological Services, LLC, and
NAEVA Geophysics, Inc.



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Project Author: Benjamin Ford, Ph.D.

April 2024

MANAGEMENT SUMMARY

On November 8, 2023, NAEVA Geophysics, Inc. conducted a Ground Penetrating Radar [GPR] survey within two discrete burial grounds at the Union Baptist Church (Shores) Cemetery in Fluvanna County, Virginia (Figure #1). The goal of the GPR survey was to document the number and extent of both marked and unmarked interments within the oldest parts of the cemeteries.

The GPR survey identified a total of 223 graves, 18 in a small early burial ground located north of the church, and 205 in a larger contemporary burial ground located west of the church. 215 of the GPR identified graves, or approximately 96% of the GPR-identified interments were characterized as 'high' or 'medium' confidence, while only 8 or 4% were characterized as 'low' confidence.

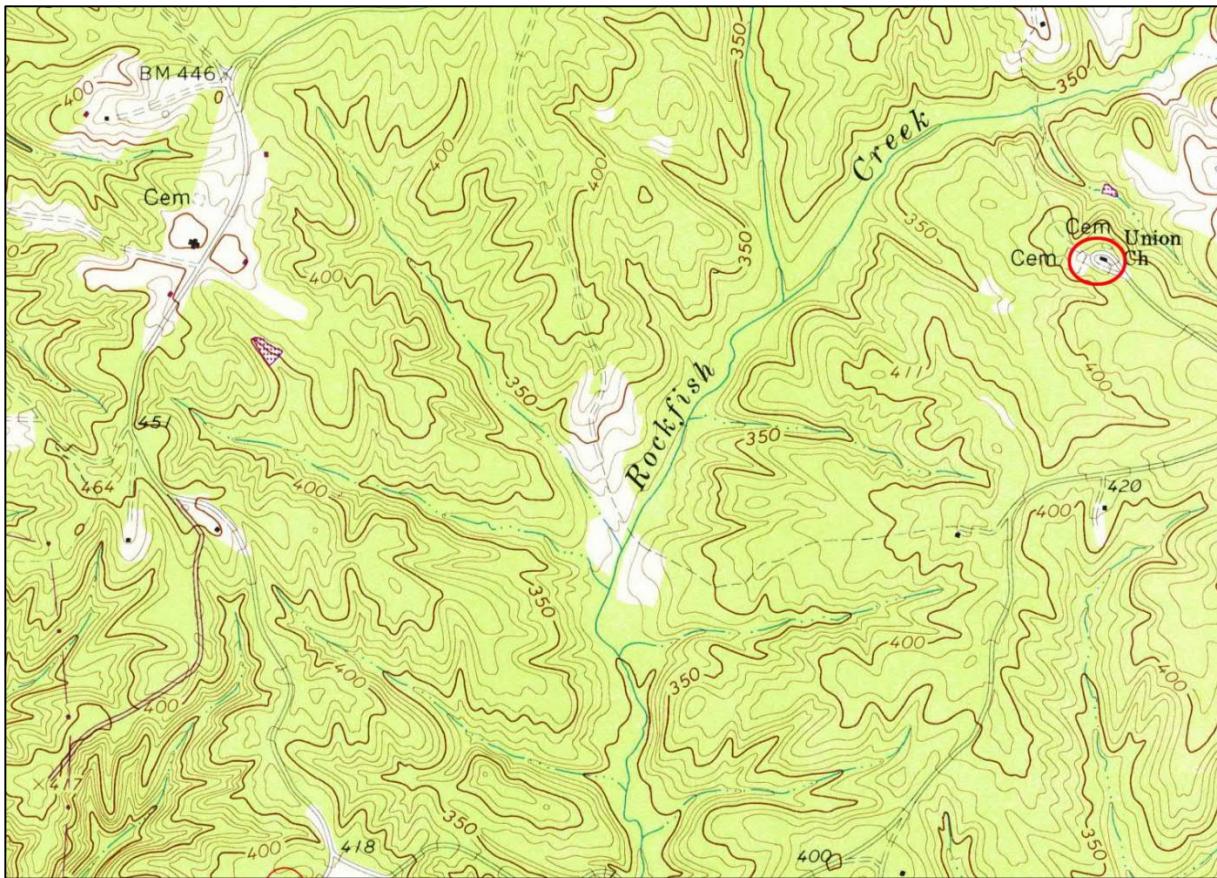


Figure #1: Detail, *U.S.G.S. Scottsville, Virginia Quadrangle*, showing the red-circled location of the Union Baptist Church (Shores).

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PROJECT SETTING

The Union Baptist Church and Cemetery is located at 714 Union Church Road in Palmyra, Virginia. The Ground Penetrating Radar [GPR] project area lies on either side of the ca. 1871 Union Baptist Church, and is composed of a large approximately 0.34-acre rectangle lying west of the church (Area A), and a smaller approximately 0.09-acre cemetery (Area B) lying north-northeast of the church (Figure #2).



Figure #2: The Union Baptist Church Cemetery GPR project area, outlined in red, showing the approximate locations of the larger contemporary cemetery west of the church (A), and the smaller early cemetery north of the church (B). Google Earth, 2023.

Both cemeteries are open and covered predominantly in turf, however the larger cemetery west of the church contains mature trees on its eastern end. While the smaller eastern cemetery is relatively level ground, the larger western cemetery slopes subtly to both the west and south (Figures #3 through 7).

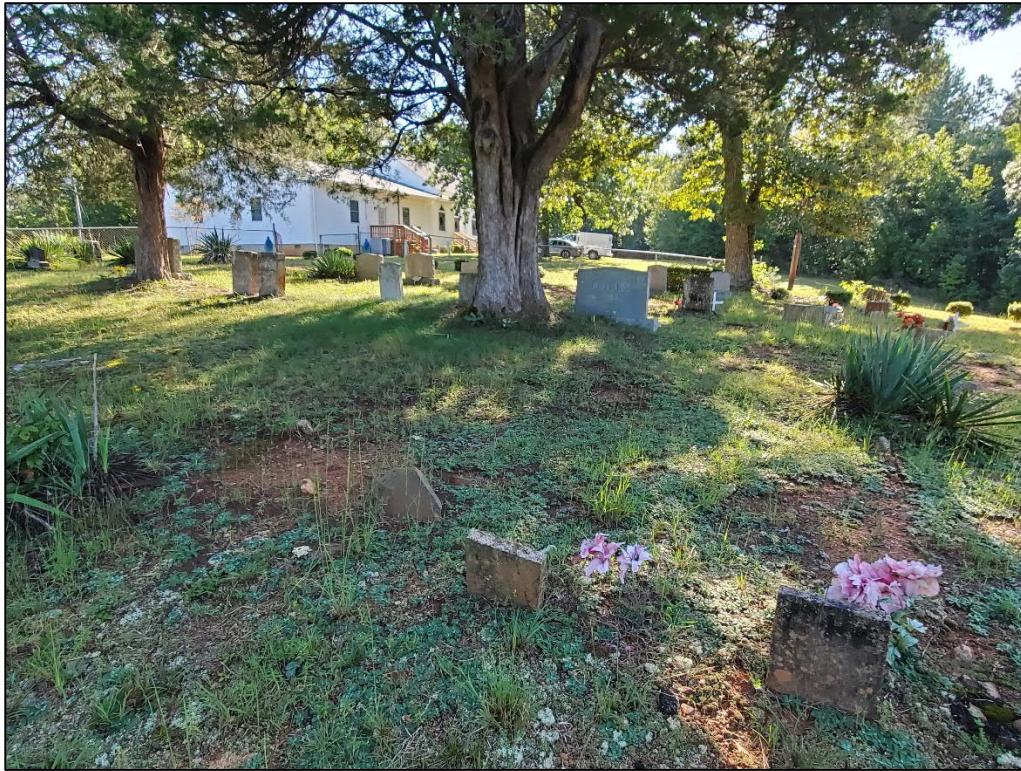


Figure #3: The western or larger cemetery, looking east-northeast and showing the Union Baptist Church in the background.



Figure #4: The western or larger cemetery, looking southwest.



Figure #5: Western or larger cemetery, looking north, showing fieldstone markers identifying burials.



Figure #6: Eastern or smaller cemetery, looking north-northwest, showing the log boundary markers.



Figure #7: Eastern or smaller cemetery, looking west, showing grave markers and a monument.

Elevations within the Union Baptist Church Cemetery project area were fairly level ranging from between 421 – 422 feet amsl in the smaller northern cemetery, and 419 - 422 feet amsl in the larger western cemetery.

PROJECT UNDERSTANDING

The Union Baptist Church at Shores, Virginia was founded in 1871 as a place of worship and refuge for recently emancipated African Americans. It is assumed that burials at the church began about the same time as, or shortly thereafter, its founding. Based on a meeting with church members, two areas were chosen for Ground Penetrating Radar survey: a large approximately 0.34-acre rectangle lying west of the church; and a smaller approximately 0.09-acre cemetery lying north-northeast of the church. Both these cemeteries were chosen because of their old age and also due to the lack of early burial records. Although each of the two cemeteries contain surface features (e.g. grave slumps, headstones, footstones, fieldstone markers) that document the location of individual burials, there are also large gaps within both cemeteries where there are no surface features.

The Union Baptist Church congregation is desirous of knowing the number and location of all burials within each of the early cemeteries, and to more fully defining their extent. The goal of the Ground Penetrating Radar survey is to identify all human interments within the project area.

HISTORIC CONTEXT¹

Colonial and Early National Period Fluvanna County

Only a year following the Declaration of Independence, in 1777 citizens of what would become Fluvanna County successfully petitioned the General Assembly of Virginia for their separation from Albemarle County. Fluvanna County was a small but conveniently located jurisdiction bounded by the James River on the south, Albemarle County on the west, Louisa County on the north and Goochland County on the east. Cutting through the center of the County was the Rivanna River. The confluence of the Rivanna and James Rivers occurred at Columbia making this small town an important commercial and business center from the late eighteenth century through the mid-nineteenth century.

Land in what would become Fluvanna County was first settled by European Americans during the second quarter of the eighteenth century. The earliest European settlers were British Loyalists, nearly all non-residents who patented large tracts of land predominantly located in the fertile alluvial bottomlands along the James River. Over time, large plantations were established on these tracts. Significant numbers of enslaved African Americans were purchased by these early landowners and provided the labor necessary to produce tobacco on a large scale. The plantations were managed by one or more white overseers who were responsible for clearing and improving the land and producing a marketable tobacco crop. Following the American Revolution, many of these plantations were purchased by white residents of Virginia; however, the system of plantation slavery continued through the first half of the nineteenth century.

During the post-Colonial period, numerous plantations were established along the north side of the James River in Fluvanna County. These plantations, including Bremo (VDHR 032-0002), Melrose (VDHR 032-0019), Western View (VDHR 032-0114), and Oak Grove (VDHR 032-0100) were dependent upon the labor of enslaved individuals. Thomas Shores acquired over 750 acres of land from John Ware along the James River in 1793. Shores established a plantation on his lands, as well as a grist mill on Rockfish Run named Virgin Mills. Charles Scott also purchased 400 acres from the John Ware estate in 1810. By 1813 he had built for himself a residence, what is now known as Melrose. In the 1820s, Charles Scott also built the large brick Middleton Mill on the James River. With the completion of the James River and Kanawha Canal in 1840, this small commercially-oriented community overlooking the James River would come to become known as Shores.²

Like many other central Virginia counties, the population of Fluvanna County in the seven decades prior to Emancipation reflected the growing overall population of the region. Between 1790 and 1850 the percent of enslaved African Americans living in Fluvanna County grew from a small minority of to a majority of the overall population. While never larger numerically, the population of free Blacks living in Fluvanna County grew as a percentage of the total from one half of one percent in the late

¹ Portions of this section were researched and written by Martha Jessup and Andy Barlow. Significant research on Reverend Samuel R. Harris was accomplished by Patricia Johnson.

² Ellen Miyagawa, "Journey to the Past: Seven Islands and Shores," 5-11, 21-22, 29-30. Bulletin of the Fluvanna Historical Society, Vol. 36 (October 1983): 5-34; Minnie Lee McGehee, "Old Mills of Fluvanna," Bulletin of the Fluvanna Historical Society, Vols. 10-11 (1970): 17; "Seven Islands, Fluvanna County, Virginia," <http://sevenislandsoffluvanna.wordpress.com/early-settlers-arrive/>, accessed February 21, 2024.

eighteenth century to nearly 3% in 1830, followed by a slow decline over the decades between 1830 to 1860 (Table #1).

Table #1: Fluvanna County Population by Race, Number and Percent, 1782 – 1860.

Year	Total Pop	White	%	Enslaved	%	Free Black	%
1782	1985	1330		n/a		n/a	
1790	3921	2430	61.97	1466	37.38	25	0.63
1800	4623	2659	57.51	1920	41.53	44	0.95
1810	4775	2576	53.94	2142	44.85	57	1.19
1820	6704	3375	50.34	3206	47.82	123	1.83
1830	8221	4223	51.36	3759	45.72	239	2.90
1840	8812	4445	50.44	4146	47.04	221	2.50
1850	9487	4539	47.84	4737	49.93	211	2.22
1860	10353	5260	50.80	4994	48.23	99	0.95

Post-Emancipation Fluvanna County

Immediately following the Civil War, many formerly enslaved African Americans sought to assert their independence and civil rights as full citizens of the Commonwealth. During the Reconstruction period, many large former plantations were broken up and sold as smaller parcels. Although some formerly enslaved individuals fled Virginia and the larger south, many African Americans took advantage of this opportunity and began to purchase land in Fluvanna County, establishing their own communities centered around churches and schools. These early communities were largely agriculturally focused and many residents initially practiced subsistence and limited commercial farming. From the late nineteenth to the early twentieth century, these communities expanded as new property owners and second and third generation African Americans were able to purchase and own land. Most of these African American families were farmers who worked the land growing crops and caring for livestock. However many were also skilled laborers including boatmen, cooks, carpenters, bricklayers, blacksmiths and wheelwrights.

The establishment of Fluvanna County's rural African American communities during the late 1800s occurred within a context of overt racism where the Commonwealth and local government attempted to restrict the rights and freedoms of its black citizens. In this era, laws were designed to incarcerate African Americans for minor offenses, forcing them to work for poor wages or a share of a crop, prohibiting interaction with whites, and codifying segregation in all parts of life. Despite this, Fluvanna's early African American communities persisted and thrived, ultimately forming institutions that provided the basis of Black religious, educational, social and political life.

Union Baptist Church, Shores, Virginia

The present Union Baptist Church stands in the historic Shores community west of Shores Road (State Route 640) in Fluvanna County, Virginia. The Shores area is bounded by Hardware Road to the West, Shores Road to the east, West River Road (State Route 6) to the north, and the James River to the South.

Stories from the elders tell about the Church's founding:

Back during the early years of organization of the present Union Baptist Church, Shores, we can picture in our minds the brethren and sisters going from house to house for the purpose of honoring God with their prayer and songs. Finally, the Holy Spirit directed them to launch out into the deep and let down their nets for a draught. They followed the direction of the Holy Spirit and let down their nets into the woods on a certain portion of land which they named "Point Look Out." They cut down trees and built a brush harbor under which to hold their Revivals. It was a great Revival; many souls were converted. After the great Revival at Point Look Out, the church selected this spot of ground on which to build. First, they built a log church...in 1869.³

According to tradition, the first structure that housed the Union Baptist Church congregation was a brush arbor. Shortly thereafter, a log cabin was constructed, affording worshippers more permanency. Union Baptist Church congregation grew over a period of several years before the church was formally established in 1871. In 1872 Adam Porter Seay and his wife Mary Seay sold a one-acre parcel of land in the Point Look Out vicinity to Church Trustees Holman Lewis, Charles Wells, and Julian Harris for \$25.00. The deed specified that the land sold to the Trustees was to be used exclusively "for a place of divine worship for the use of the colored members of Union Baptist Church of Fluvanna and for no other purpose whatever."⁴ Church members would name this parcel Point Look Out.

The 1867 Fluvanna County Personal property tax records document the presence of six black men who were recorded as living within the Point Look Out vicinity: Benjamin Harris, George Jackson, Edward Jones, Henry Pendleton, David Winston, and Henderson Wyatt. Because they resided at Point Look Out, it is likely that these men, or members of their immediate family, may have been early members of Union Baptist Church.⁵

The 1870 U.S. Census records Holman Lewis as a 46-year-old farm laborer, Charles Wells as a 30-year-old farm laborer, and Julian Harris as a 37-year-old farm laborer. Immediately following Emancipation, these men likely initially worked for adjacent white landowners, plantations and farms upon which they may have been formerly enslaved. However, the 1880 and 1900 U.S. Census also documents a transition to property ownership, recording that Wells and Harris became farmers, presumably owning and cultivating their own land.⁶

The present Union Baptist Church was constructed ca. 1886 and services began there the same year.⁷

In 1904, Adam and Mary Seay again sold an additional acre of land to church Trustees Samuel Washington, Charles Wells, and Julian Harris for \$10. The new parcel lay "on the south side of and adjoining the lot on which the Union Baptist Church now stands."⁸ The 1900 U.S. Census records that Samuel Washington was a 52-year-old blacksmith, a trade that he may have learned while enslaved.

³ Souvenir Journal for Union Baptist Church's 120th Anniversary, 1989. Union Baptist Church (Shores), Fluvanna County, Virginia.

⁴ Fluvanna County Deed Book (OS) 21:161. Clerk's Office, Fluvanna County Courthouse, Palmyra, Virginia.

⁵ Fluvanna County Persona Property Tax Records, 1867. Clerk's Office, Fluvanna County Courthouse, Palmyra, Virginia.

⁶ Ninth U.S. Census, 1870. Population Statistics, Fluvanna County, Virginia; Tenth U.S. Census, 1880. Population Statistics, Fluvanna County, Virginia; Twelfth U.S. Census, 1900. Population Statistics, Fluvanna County, Virginia.

⁷ Horace Scruggs, Interview with Bertha Armstrong, in "Reconstructed: The Rebuilding of African American Communities Through Faith and Education." Video, 2023; Fluvanna Leaders for Race and Diversity, "A History of African American Churches in Fluvanna County," 2021.

⁸ Fluvanna County Deed Book 1:64. Clerk's Office, Fluvanna County Courthouse, Palmyra, Virginia.

Washington had a large extended family in the Shores community, many of whom are buried in the Union Baptist Church (Shores) Cemetery. It is likely that this one acre of land adjacent to and south of the church was used as additional burying grounds.

A small square parcel adjoining the northern boundary of the Union Baptist Church property and containing approximately 0.059 acres and several graves was transferred to the church from the McGehee family in 1999.⁹

Union Baptist Church Leadership

The Reverend Samuel R. Harris was the first Pastor of Union Baptist Church (Figure #8). Fluvanna County records first document Samuel Harris as a 25-year-old laborer cohabitating with his wife Willie Ann Harris, a 19-year-old, in 1866. County records also document that Samuel Harris entered into a labor contract with Robert Alvis in 1867 to perform work on Cleveland, a plantation Alvis had acquired just before Emancipation. Alvis was a well-known Richmond slave trader in the pre-Emancipation period.¹⁰ A decade later in 1880, R. S. Harris is listed as a 43-year-old minister and head of household living with his wife Willie A., 30-years-old, and five children Fannie W. (18), Paton F. (14), Ellen J. (10), William A. (7), and Richard B. (5). Samuel and Willie's eldest daughter and son worked as a domestic servant and 'on railroad' respectively.¹¹

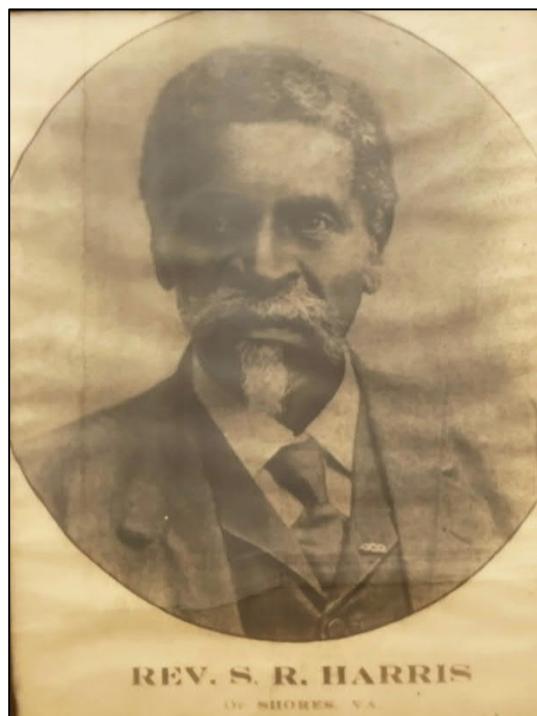


Figure #8: The Reverend Samuel R. Harris. Courtesy of Union Baptist Church, Shores.

⁹ Fluvanna County Deed Book 373:836, 840. Clerk's Office, Fluvanna County Courthouse, Palmyra, Virginia.

¹⁰ Fluvanna County, Register of Colored Persons Cohabitating together as Husband and Wife, February 27, 1866. (Richmond: Library of Virginia); Fluvanna County Persona Property Tax Records, 1867. Clerk's Office, Fluvanna County Courthouse, Palmyra, Virginia.

¹¹ Ninth U.S. Census, 1870. Population Statistics, Fluvanna County, Virginia; Tenth U.S. Census, 1880. Population Statistics, Fluvanna County, Virginia.

In the 1900 Federal census, Samuel Harris was listed as a 64-year-old preacher with a 55-year-old wife named Willie and two sons, Richard a 24-year-old school teacher, and William a 17-year-old who was 'in school.' In 1910, Samuel Harris was documented as a 51-year-old minister, living with his 53-year-old wife Willie. In the 1920 Federal census, Samuel R. Harris was documented as an 88-year-old preacher, living with his 72-year-old wife Willie, a 53-year-old son and farmer Peyton, a 42-year-old daughter-in-law Mary, 7-year-old granddaughter Marcella, and 5-year-old grandson Samuel.¹²

Samuel R. Harris, the first Minister of Union Baptist Church died at the age of 92 on January 21, 1923. The cause of death was listed as 'heart disease' with a contributing factor of 'old age.' He was buried at the Union Baptist Church cemetery.¹³

Pastors of Union Baptist Church include the Reverends S. C. Abrams, H. R. Clarke, Devon Coles, Lloyd Feggans, Joseph Haden, Jessie Johnson, W. J. Jones, W. J. Kerr, Wilbert D. Magbie, W. O. Mayo, Lawrence Pallard, O. C. Perkins, Charlie Smith, Elwood White and Melvin Woodson.

Deacons of Union Baptist Church include Joseph Abrams, James Bransom, Henderson Causby, David Goff, Sr., Frank Jackson, Phillip Kelley, Frank Morris, George Morton, John Randolph, Joe Seay, Willie Smith, Jr., Sheridan Staton, Percy Thomas, Sr., Tommy Thomas, Waverly Thomas, Clinton Thompson, Maynard Woodson, Phillip Woodson, Wesley Woodson and Odell Woodson.

Deaconesses of Union Baptist Church include Julia Smith and Mary Woodson.

¹² Twelfth U.S. Census, 1900. Population Statistics, Fluvanna County, Virginia; Thirteenth U.S. Census, 1910. Population Statistics, Fluvanna County, Virginia; Fourteenth U.S. Census, 1920. Population Statistics, Fluvanna County, Virginia.

¹³ Commonwealth of Virginia, Bureau of Vital Statistics. Certificate of Death for Samuel R. Harris.

PREVIOUS RESEARCH

No previous archaeological research has been conducted within the Union Baptist Church (Shores) Cemetery.

Research is currently being conducted on burials at Union Baptist Church (Shores) in online databases, funeral home records, and state death certificates.

RESEARCH DESIGN

The GPR survey focused on two discrete cemeteries at Union Baptist Church (Shores). Each of the cemeteries was chosen for GPR survey based on their old age and a lack of early burial records.

The goal of the Union Baptist Church (Shores) Cemetery GPR survey was twofold:

1. To locate and define the extent of marked and unmarked graves within the approximately 0.46-acre project area; and
2. To produce an archaeological report interpreting the findings of the GPR survey and placing it in an appropriate historic context.

Research incorporated two components: 1) the GPS mapping of all grave slumps and grave markers within each cemetery; and 2) a close-interval GPR survey of each cemetery.

The GPS mapping and GPR survey, data processing, and analysis was conducted by NAEVA Geophysics (Charlottesville, Virginia) on November 8, 2023. Prior to GPS mapping each grave slump and grave marker within each cemetery were flagged (Figure #9). Mapping of all surface features was then conducted using a Trimble R12 with centimeter level horizontal accuracy. Grave markers were characterized as either headstones [gravestone], footstone, or stone [fieldstone].



Figure #9: Larger western cemetery, looking west-southwest, showing blue-flagged grave markers.

Allowing for vegetation and other immovable obstructions, the GPR survey covered as completely as possible the entire project area through close-interval (0.5-meter) north-south oriented transects throughout the entire project area. The north-south orientation of the transects was chosen because it was perpendicular to the long-axis of most traditional east-west oriented burials, thereby enhancing the potential for their identification and definition.

GPR data returns recorded digitally during the survey were examined in both profile and plan view visualizations to enable the detection of subsurface 'anomalies' potentially consistent with expectations for the geophysical signatures of unmarked grave shafts. In particular, the data was examined for the presence of strong reflectors, signals presenting in the form of deep and wide hyperbolas, and presence of these reflectors on three adjacent lines. Based on a preliminary analysis of the data, the GPR-identified anomalies were characterized into a tripartite division including 'high confidence,' 'medium confidence,' and 'low confidence' human interments. High confidence human interments were those GPR-identified anomalies that possessed the spatial dimensions (e.g. width, length, depth, orientation and patterning, etc.) to classify as human interments with strong confidence. Medium confidence human interments were those GPR-identified anomalies that possessed some of the spatial dimensions to classify as human interments. Low confidence human interments were those GPR-identified anomalies that possessed only a few of the spatial dimensions to classify as human interments. GPR generated data were also manipulated in software to produce horizontal 'slices,' documenting the location, appearance and disappearance of anomalies in 0.15-meter depths. The location and orientation of all GPR-identified grave-like features identified during the survey were mapped.

GEOPHYSICAL FINDINGS

Mapping of Surface Features

On November 7, 2023, NAEVA Geophysics, Inc. marked and mapped all surface features present in both cemeteries. A total of 49 grave slumps were identified, 36 in the larger western cemetery, and 13 in the smaller northern cemetery. A total of 234 grave markers or monuments were identified: 213 in the larger western cemetery, and 21 in the smaller northern cemetery. By far, the largest type of grave marker was a simple fieldstone ($n = 172$) composing up 73.5% of all grave markers (Table #2).

Table #2: Mapped Surface Features in two cemeteries.

	Grave Slumps	Headstone [gravestone]	Footstone	Stone [fieldstone]	Totals
Larger Cemetery	36	56	5	152	249
Smaller Cemetery	13	1	n/a	20	34
Totals	49	57	5	172	283

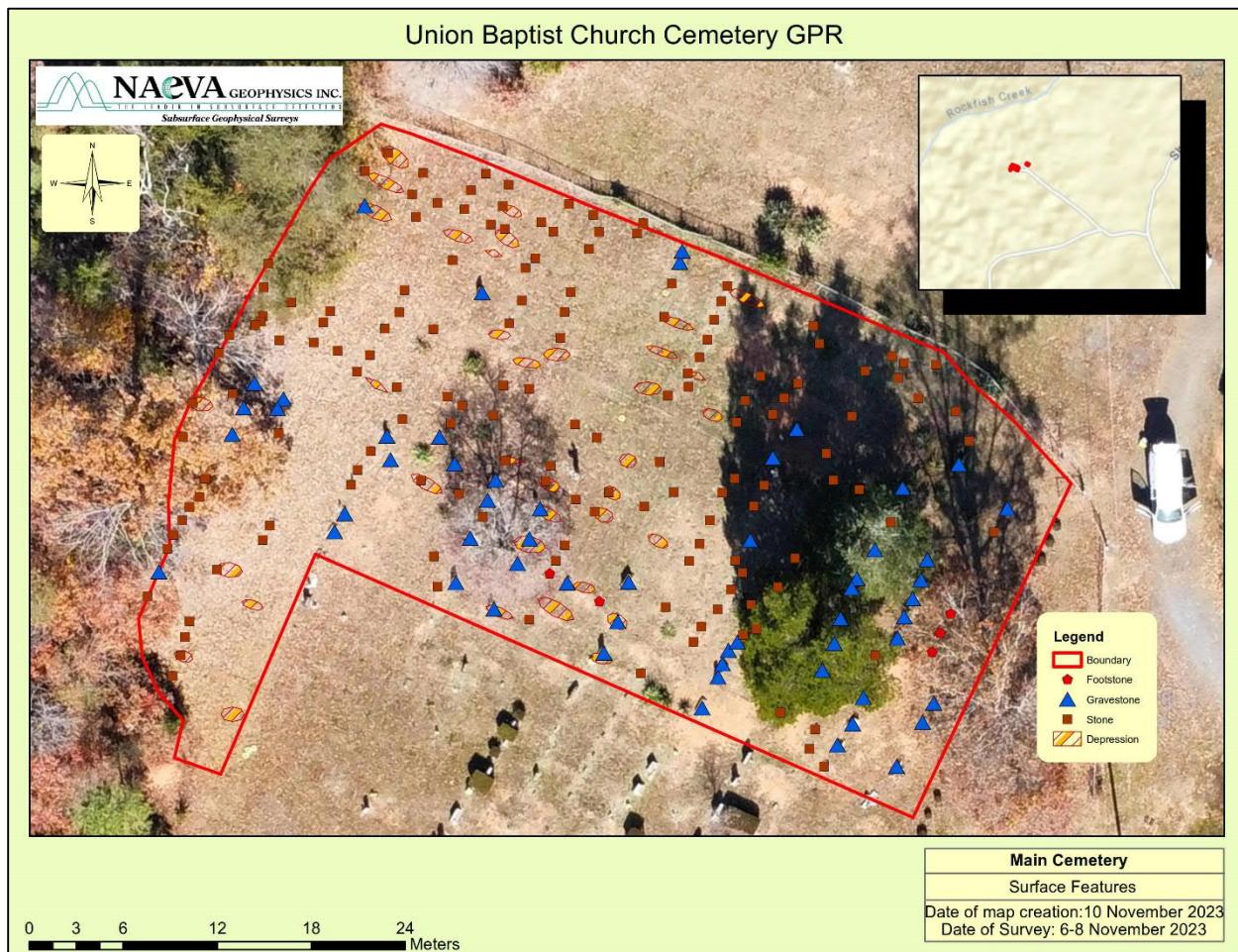


Figure #10: Larger western cemetery showing location and type of surface feature. *NAEVA Geophysics, Inc.*, 2024.

Within the larger western cemetery formal headstone markers appeared to be clustered along the southern and eastern edges of the survey area. Likewise, while simple fieldstone markers were all over, they appeared to predominate on the northern and western eds of the survey area. Grave slumps too appeared to be absent from the eastern portion of the larger cemetery and concentrated predominantly in the central and northern portions. Grave markers within the larger western cemetery appeared to be arranged in distinct, visible rows (Figure #10).

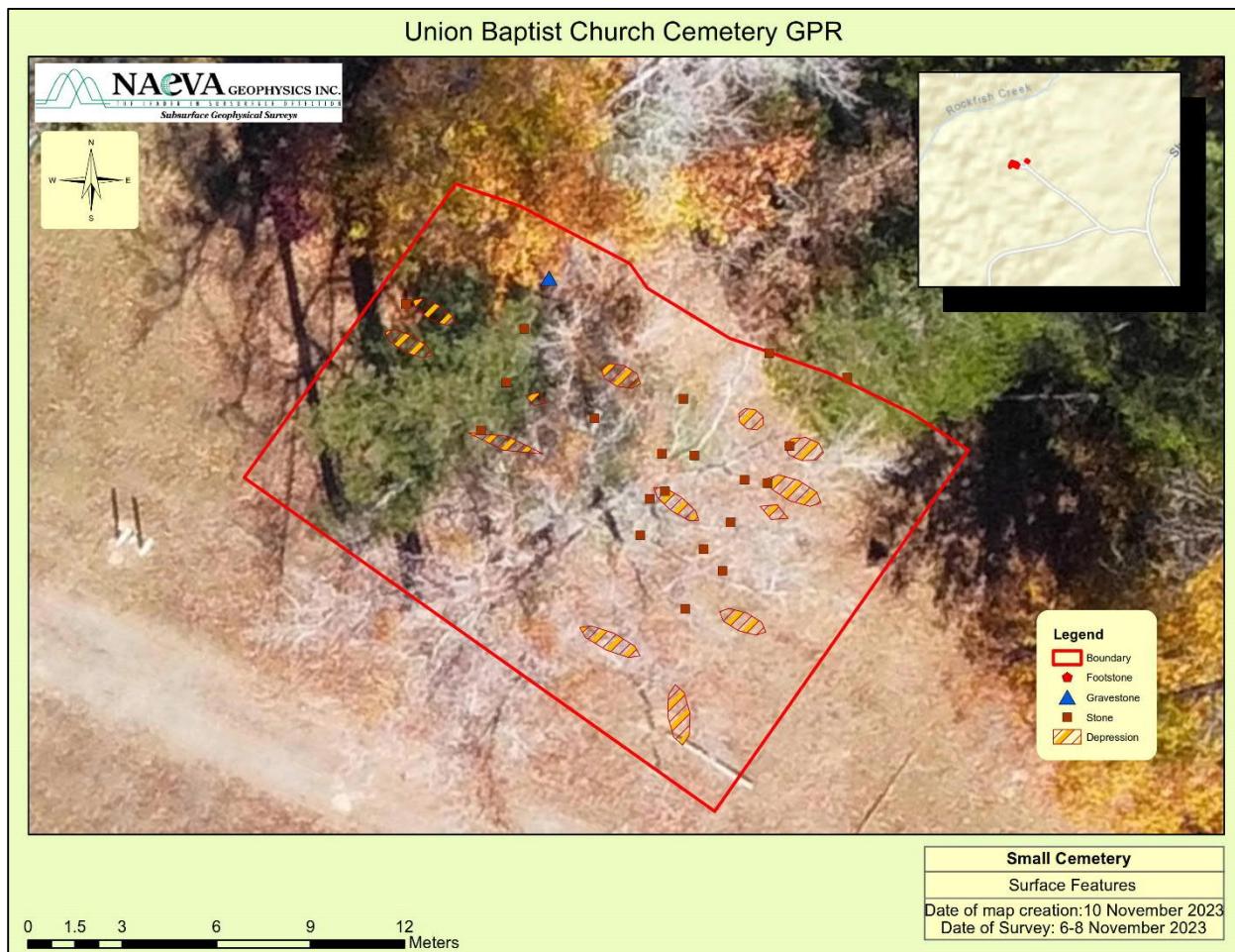


Figure #11: Smaller northern cemetery showing location and type of surface feature. *NAEVA Geophysics, Inc.*, 2024.

Within the smaller northern cemetery only one large monument or headstone marker was present centered between two cinderblock bordered individual burials. Like the larger cemetery, simple fieldstone place on top of or in the top few inches of soil were predominant. Given the relatively small number of markers, the clustering of the stones appeared to suggest definable rows (Figure #11) (Table #2).

Ground Penetrating Radar [GPR] Survey

On October 8, 2023, NAEVA Geophysics, Inc. conducted a GPR survey within the Union Baptist Church (Shores) Cemetery. During the survey it was found that soils within each cemetery were conducive to seeing GPR-identified anomalies clearly at great depth (Figures #12 and 13).



Figure #12: GPR Survey in progress, Union Baptist Church (Shores) Cemetery.



Figure #13: GPR Survey in progress, Union Baptist Church (Shores) Cemetery.

Number of Human Interments

A total of 223 'graves'¹⁴ were identified within the Union Baptist Church (Shores) Cemetery GPR survey project area. Following data processing and based on an assessment of the data, a tripartite model was used to characterize the GPR-identified anomalies. Overall, a total of 143 high confidence graves were identified; 72 medium confidence graves were identified, and only 8 low confidence graves were identified (Table #3).

Table #3: Number of GPR-Identified Burials within the larger and smaller cemeteries.

GPR-Identified Graves	Large Cemetery		Small Cemetery		Total	
	No.	Pct.	No.	Pct.	No.	Pct.
High Confidence	136	66.34	7	38.88	143	64.12
Medium Confidence	66	32.19	6	33.33	72	32.28
Low Confidence	3	1.46	5	27.77	8	3.58
Totals	205	100.00	18	100.00	223	100.00

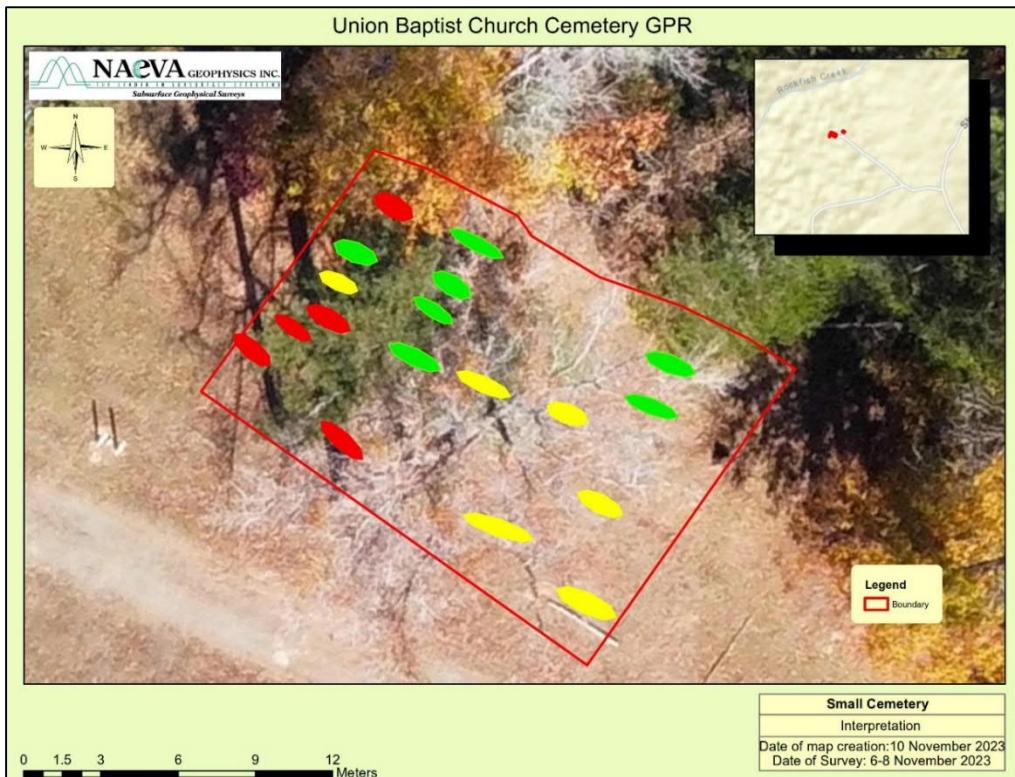


Figure #14: Plan showing number and location of interpreted GPR-identified graves within the smaller northern cemetery. *NAEVA Geophysics, Inc.*, 2024.

¹⁴ The 223 GPR-identified graves within survey project area represent the minimum number of human interments located in both cemeteries. The age and preservation of burials, as well as soil conditions and areas where tree roots or compacted clay-rich soils are prevalent, impact the ability of GPR to recognize subgrade anomalies. Because of this, it should be understood that there may be additional undocumented graves that the GPR data did not identify.

Of the 202 'graves' identified within the larger western cemetery, a total of 136 (66.34%) were characterized as high confidence; a total of 66 (32.19%) were identified as medium confidence, and only 3 (1.46%) were identified as low confidence. Of the 18 graves identified within the smaller northern cemetery 7 were characterized as high confidence; 6 were characterized as medium confidence, and 5 were characterized as low confidence (Figures #14 and 15) (Table #3).

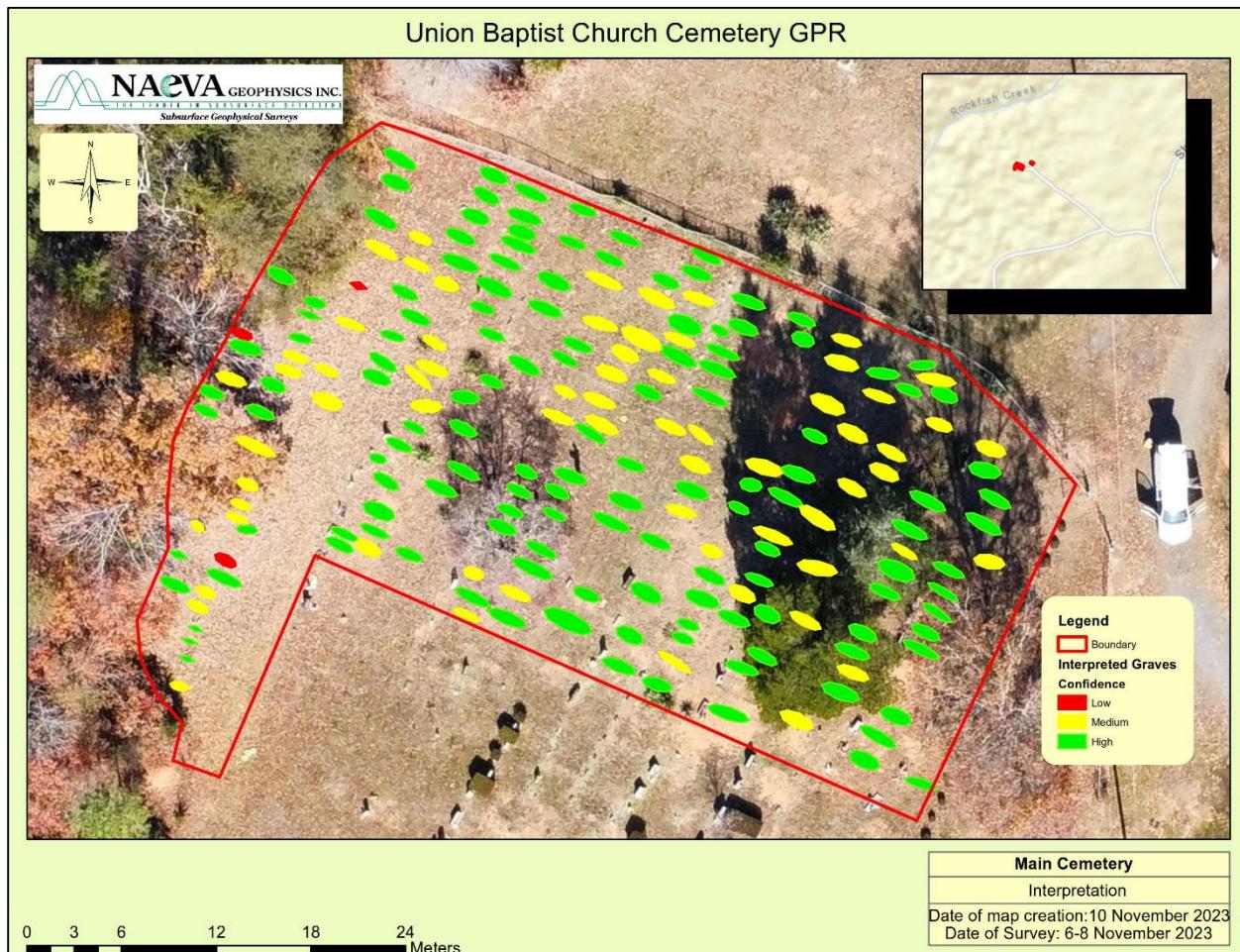


Figure #15: Plan showing number and location of interpreted GPR-identified graves within the larger western cemetery. *NAEVA Geophysics, Inc.*, 2024.

RESEARCH SUMMARY AND DISCUSSION

Distribution and Spatial Patterning of Human Interments

The following discussion of findings will be broken down into the two discrete survey areas, the larger burial ground located west of Union Baptist Church, and the smaller burial ground located north of Union Baptist Church.

Without exception, GPR-identified graves within both burial grounds were found to be oriented in an east-west direction. In general, they also appear to be fairly evenly distributed across each project area. Within the larger western cemetery, burials were identified in discrete rows that were densely concentrated throughout the majority of the survey area. Along the western periphery of the larger cemetery, only two long rows of burials were present. Many of these interments appeared to be small sized, suggesting that they contain children or youth. Adjacent to and east of this area was an approximately 70-foot-long gap north-south oriented gap where no burials were identified (Figure #16).

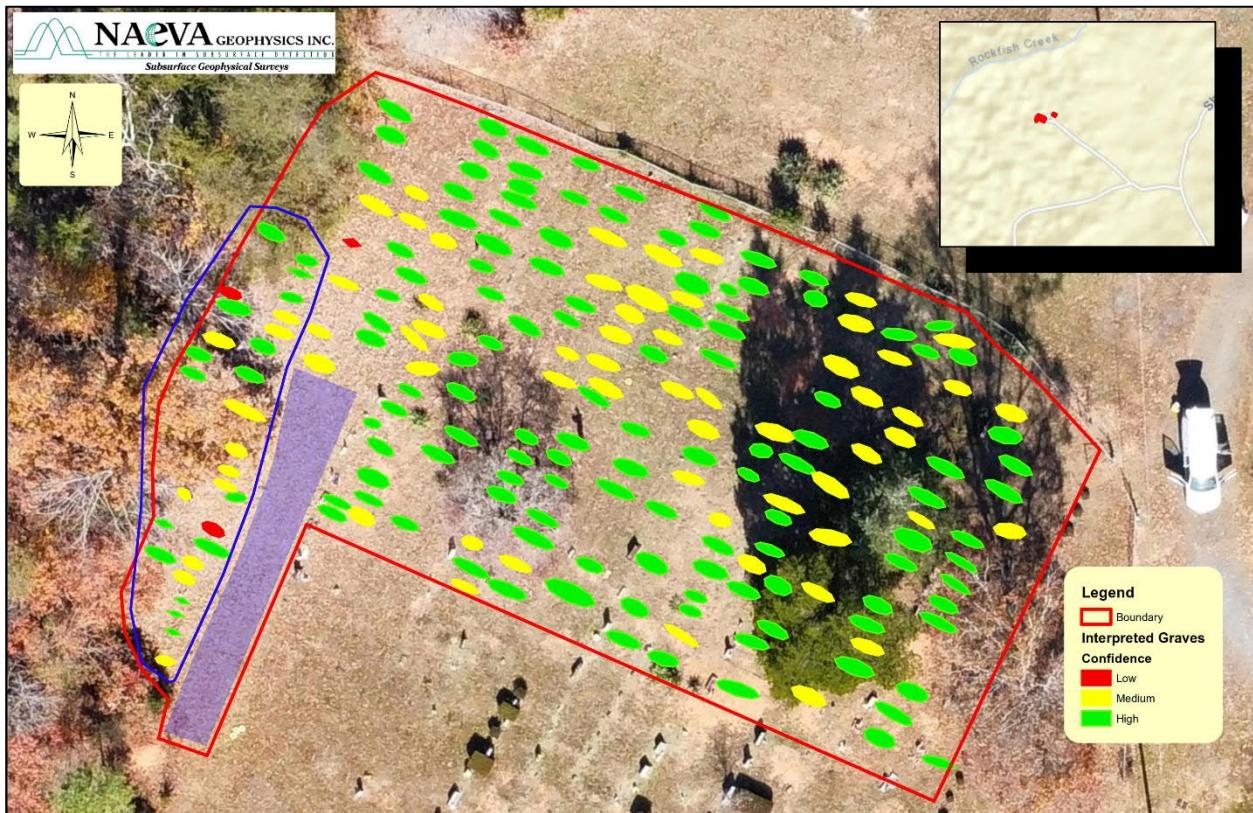


Figure #16: Large western cemetery showing blue outlined area composed of two rows with numerous small-sized interments, and blue shaded gap where no graves were identified.

In the smaller northern burial ground, GPR-identified graves appeared to be organized into at least two distinct rows and were clustered at the western end of the project area, adjacent to and surrounding the only headstone / monument in the vicinity. Towards the eastern end of the burial ground, graves appeared to be less numerous and more scattered (Figure #17).



Figure #17: Small northern cemetery showing blue outlined area composed of two organized rows of burials.

Age of Individuals Buried in Union Baptist Church Cemetery

Determining the age of individuals buried within any cemetery is an inherently subjective process. Without additional contextual information, age of the buried individual is based solely on grave size, and particularly the length of the surface feature or GPR-identified grave. While most of the interments within the Union Baptist Church burial grounds appeared to be adults, approximately 35 to 45 or 16 to 20% of all burials were small, likely representing children or youth.

General Observations

The significant number of marked and unmarked interments identified within the study area document both the large late nineteenth to first-half of the twentieth-century Shores vicinity African-American population, as well as the importance of Union Baptist Church within the dispersed rural African-American community of Shores.

RECOMMENDATIONS

Ongoing archival research into documenting the names of individuals buried within the Union Baptist Church (Shores) Cemetery should continue to utilize primary and secondary source records including the Find a Grave database, State Death Records, funeral programs, and local Funeral Home Records. Likewise institutional memory, and the memory of older church members, is a particularly valuable resource. Information on the names of families and individuals who may be buried within the Union Baptist Church Cemetery should be collected from church elders. The goal of this research is to build a cumulative list of individuals who have been interred at Union Baptist Church.

Union Baptist Church leaders and members should continue to utilize the Virginia Historical African American Cemetery Graves Fund administered by the Virginia Department of Historic Resources. This is an annual fund which is available to eligible entities and may be used for the care and maintenance of historical African American cemeteries and graves that were established prior to 1948. Virginia Department of Historic Resources staff are a valuable resource and are available to assist church leaders as needed.

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1870 Ninth U.S. Census, 1870. Population Statistics, Fluvanna County, Virginia.

Union Baptist Church Cemetery
List of Known Interments

<u>Surname</u>	<u>First Name</u>	<u>Date of Birth</u>	<u>Date of Death</u>	<u>Source</u>	
Abrams	Aubrey	1918	1997	FHS - Church and Public Cemeteries (2018)	Find A Grave
Abrams	David A.	1908	1988	FHS - Church and Public Cemeteries (2018)	Photo of stone and funeral program on UBC Website
Abrams	Luther M.	1887	1968	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Abrams	Martin W.	1908	1990	Funeral Program on UBC Website	
Abrams	Olivia Beatrice	1895	1999	Placard	
Abrams	Ophelia	1920	1949	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Abrams	Samuel C.	1892	1973	FHS - Church and Public Cemeteries (2018)	Photo of stone and historic placard on UBC Website
Anderson	Lillie Wells	unknown	2000	FHS - Church and Public Cemeteries (2018)	Photo of stone and funeral program on UBC website
Arnold	Pearl S.	1923	1993	FHS - Church and Public Cemeteries (2018)	
Carter	Clara E.	1881	1971	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Carter	Clara F.	1911	2001	FHS - Church and Public Cemeteries (2018)	Photo of stone and funeral program on UBC Website
Carter	George R.	1876	1956	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Cheatham	Charlie	1875	1943	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Cheatham	Mary J.	1918	1973	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Coles	Annie	1894	1966	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Coles	Poindexter	1865	1961	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Emerson	Maria	unknown	unknown	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Evans	Pearl S.	1901	1955	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Faulds	Lucy M.	unknown	1962	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Goff	David W.	1889	1976	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Goff	David Walker Jr.	1923	2002	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Goff	Jeannette M.	1897	1978	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Goff	Mary E.	1863	1946	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Harris	Peyton	1874	1945	Death Certificate	
Harris	Samuel R.	unknown	1923	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Harris	William A.	unknown	1973	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Harris	Willie A.	1843	1925	FHS - Church and Public Cemeteries (2018)	
Holland	Mabel A. Jackson	1895	1965	Find-A-Grave	Death certificate, family data on UBC Website
Jackson	Emmett L.	1898	1957	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Jackson	Frank N.	1884	1963	FHS - Church and Public Cemeteries (2018)	
Jackson	Irvin R.	1900	1974	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Jackson	Jannie V.	1894	1966	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jackson	Lee	1855	1929	FHS - Church and Public Cemeteries (2018)	Death certificate
Jackson	Lucy Banks	1862	1935	FHS - Church and Public Cemeteries (2018)	
Jackson	Mabel	1890	1965	FHS - Church and Public Cemeteries (2018)	Find A Grave
Jackson	Stuard	1886	1956	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jackson	Willie	unknown	unknown	FHS - Church and Public Cemeteries (2018)	
Johnson	Eliza	1831	1926	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Johnson	John A.	1941	1984	FHS - Church and Public Cemeteries (2018)	

Union Baptist Church Cemetery
List of Known Interments

<u>Surname</u>	<u>First Name</u>	<u>Date of Birth</u>	<u>Date of Death</u>	<u>Source</u>	
Johnson	Marie	1894	1995	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Alexander	1866	1949	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Alice V.	1871	1959	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Annie	1925	1925	FHS - Church and Public Cemeteries (2018)	Death certificate, family data on UBC Website
Jones	Henry Lee	1865	1961	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Jones	Hilton M.	1930	1986		Photo of placard on UBC Website
Jones	Leila	unknown	1980	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Jones	Lucille Berkeley	1920	1973	Death Certificate	
Jones	Martin W.	1910	1990	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Merritt L.	1868	1929	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Miles M.	1895	1937	FHS - Church and Public Cemeteries (2018)	Find A Grave
Jones	Phillip Henry	1903	1982	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Roosevelt T.	1901	1967	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Thelma S.	1910	1968	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	Varah Elizabeth	1901	1913	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Jones	William N.	1900	1964	FHS - Church and Public Cemeteries (2018)	Death certificate, Find A Grave
Kelley	James	unknown	1931	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelley	Joyce M.	1942	1942	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelley	Phillip L. Jr.	1941	1941	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelley	Phillip L. Sr.	1905	1988	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelley	Ricky Sr.	1959	2006	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelley	Virginia Brice	1924	2008	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelly	Janice Anne	1960	1989	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelly	Mary V.	1867	1944	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Kelly	Philip J.	1857	1916	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Magbie	Frances C.	1900	1977	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Magbie	Wilbur D.	1882	1947	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
McCoy	David C.	1917	1990	FHS - Church and Public Cemeteries (2018)	Death certificate
Morton	David	1907	1964	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Morton	Eliza P.	1910	1987	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Morton	George	1865	1930	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Morton	George Henry Sr.	1946	2002	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Morton	Marvin L.	1955	2017	Find A Grave	
Omohundro	Bettie Wells	1850	1911	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Omohundro	H.	1846	1930	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Page	Roosevelt T.	1905	1972	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Payne	Ethel Jackson	1907	2004	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Porter	Dorothy L.	1925	1991	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website

Union Baptist Church Cemetery
List of Known Interments

<u>Surname</u>	<u>First Name</u>	<u>Date of Birth</u>	<u>Date of Death</u>	<u>Source</u>	
Porter	James Haskins	1908	1968	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Ross	David W.	1911	1989	FHS - Church and Public Cemeteries (2018)	Find A Grave
Ross	Florence M.	1905	1980	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Scott	Alphonso	1915	1969	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Scott	Delbert Webster Jr.	1956	1996	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Scott	Delbert Webster Sr.	1912	1979	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Scott	Johvon K.	1987	1987	Death Certificate	
Scott	Viola J.	1935	1989	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Seay	Amy W.	1928	1992	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Seay	Jim	1903	1984	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Seay	Juanita J.	1908	1983	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Seay	Junius L.	1928	1990	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Smith	Bertha Kelley	1910	1985	FHS - Church and Public Cemeteries (2018)	Find A Grave
Smith	Cornelius	1906	1973	FHS - Church and Public Cemeteries (2018)	Find A Grave
Smith	Etta	1886	1959	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Smith	Henry	1901	1928	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Smith	Lafayette	unknown	unknown	FHS - Church and Public Cemeteries (2018)	Find A Grave
Smith	Luther	1902	1919	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Smith	Minnie	unknown	1923	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Smith	Van	1878	1964	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Smith	Willie	1900	1964	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Swann	M. C.	1888	1945	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Annie	1895	1975	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Arthur Daniel	1933	2003	FHS - Church and Public Cemeteries (2018)	Funeral Program on UBC Website
Thomas	Doris W.	1931	2013	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Frederick	1895	1976	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Jacqueline Sadie	1936	1997	FHS - Church and Public Cemeteries (2018)	
Thomas	Percy A. Sr.	1892	1989	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Thomas	Percy W.	1918	1998	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Samuel Henry	1884	1963	FHS - Church and Public Cemeteries (2018)	
Thomas	Tara Joanne	1933	1973	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Tommie	1881	1975	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Thomas	Tommie Lee	1931	2002	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Waverly Nelson	1923	1991	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Thomas	Willis L. Sr.	1929	2006	FHS - Church and Public Cemeteries (2018)	Historic placard on UBC Website
Thornton	Evelyn T.	1892	1967	FHS - Church and Public Cemeteries (2018)	
Tutwiiler	Carl C.	1888	1968	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Tutwiler	Effie K.	1900	1995	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website

Union Baptist Church Cemetery
List of Known Interments

<u>Surname</u>	<u>First Name</u>	<u>Date of Birth</u>	<u>Date of Death</u>	<u>Source</u>	
Tutwiler	Maud	1866	1929	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Tutwiler	Payton	1899	unknown		Photo of stone on UBC Website
Tutwiler	Stannard	1903	1942		Photo of stone on UBC Website
Washington	Andrew	1884	1937	FHS - Church and Public Cemeteries (2018)	Death certificate
Washington	Courtney C. B.	unknown	1956	FHS - Church and Public Cemeteries (2018)	Photo of placard on UBC Website
Washington	Susan	unknown	unknown	FHS - Church and Public Cemeteries (2018)	
Washington	Thomas	1863	1929	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Wells	Eliza	1880	unknown		Photo of stone on UBC Website
Wells	George Wilson	1913	1998	FHS - Church and Public Cemeteries (2018)	Funeral program on UBC Website
Wells	Helen Thomas	1913	1999	FHS - Church and Public Cemeteries (2018)	Funeral program on UBC Website
Wells	Mae Frances	1922	1988	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Wells	Richard M.	1912	1961		Photo of stone on UBC Website
Woodson	Alice	1919	1989	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Woodson	Millie M.	1910	1938	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Woodson	Odell	1910	unknown	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Woodson	Orville	1896	1976	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website
Woodson	Peter James	1895	1975	FHS - Church and Public Cemeteries (2018)	Photo of stone on UBC Website

GPR
MAGNETICS
ELECTROMAGNETICS
SEISMICS
RESISTIVITY
UTILITY LOCATION
UXO DETECTION
BOREHOLE CAMERA
STAFF SUPPORT

Geophysical Investigation Report

**Union Baptist Church
Fluvanna County, Virginia**

Date of Investigation:
November 8, 2023

JANUARY 15, 2024

Prepared for
Rivanna Archeological Services, LLC

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Appendix

APPENDIX A. UNION BAPTIST CHURCH CEMETERY INTERPRETATION MAPS AND DEPTH SLICES

1 INTRODUCTION

1.1 Background and Objectives

NAEVA Geophysics Inc. (NAEVA) was contracted by Rivanna Archeological Services to conduct a geophysical investigation in a historic cemetery on the property of the Union Baptist Church, in Fluvanna County, Virginia. The purpose of the geophysical investigation was to attempt to ascertain the presence of unmarked graves in the cemetery. NAEVA utilized ground penetrating radar (GPR) to scan the subsurface for indications of the presence of graves.

1.2 Site Location and Description

Two areas were surveyed, outlined in red in **Figure 1**, below. The larger of the two areas (0.34 acres) lies west of the church, with headstones and field stone markers present. A smaller area (0.043 acres) lying to the northeast of the church was also surveyed. No markers are present at the surface in the smaller survey area. The GPR survey was conducted using a local grid system, set up with English system tape measures and marked with painted ropes. Data were positioned using Trimble Real Time Kinematic (RTK) GPS.



Figure 1: 11/08/23 GPR Survey area at Union Baptist Church

The survey grids made use of a Cartesian coordinate system, extending eastward and northward from the SW corner of each survey area, designated 0N, 0E. The local grid coordinates incremented to the north and east. Ropes painted with brightly colored bands at 0.5m intervals were placed in the grid as an aid to navigation while collecting radar data.

2 EQUIPMENT

2.1 Sensors and Software GPR

Ground penetrating radar utilizes the propagation and reflection of high frequency electromagnetic (EM) energy to image subsurface structures and objects. The GPR transmitter emits a pulse, which then travels through the ground and is partially reflected when it encounters an interface of two materials with differing electrical properties. The remaining energy continues downward, perhaps encountering other reflectors, or eventually dissipating due to spreading losses or attenuation in conductive materials. The GPR receiving antenna is connected to the console electronics, which digitizes the signal. The travel time of the reflected energy is very accurately measured (in nanoseconds), as well as the relative amplitude of the signal. The amplitude of the returning signal is a function of the contrast in electrical properties of the materials, and the depth.

Data were collected in a roughly North – South direction as this is favorable for detecting the typical East-West orientation of most traditional Christian burials. A Sensors and Software Noggin Plus equipped with 250 MHz antennas (**Figure 2**) was used for data collection on this project. Stacked GPR pulses into the ground were triggered using a wheel odometer connected to the GPR electronics at 2.5 cm intervals. Straight line profiling across the survey area was accomplished using guide ropes laid perpendicular to the direction of travel, painted with bands of alternating color as a visual cue.



Figure 2: Noggin Plus GPR 250 MHz



Figure 3: View to WNW of larger survey area

2.2 Trimble R12 GPS

A Trimble R12 RTK (Real Time Kinematic) GPS rover utilizing Trimble's RTX subscription based satellite correction service was used for the acquisition of positional data, to record the location of GPR grid corners, grave markers, field stones and

depressions observed in the survey areas. Horizontal accuracy of this system is approximately 2cm.

3 RESULTS

3.1 Summary of Data Processing

GPR data were processed using Sensor and Software's EKKO Project program. Hyperbolic velocity calibration was used to determine the speed of the electromagnetic waves passing through the subsurface. For the Union Baptist church Cemetery, a value of 0.100 m/ns was used which is typical for moist soils. The profile time axis was converted to depth using this speed constant for each profile. Profiles were processed with the application of an SEC2 gain to compensate for signal attenuation. Within EKKO Project, profile data were dewowed, and a migration and envelope applied. The above processes refine the amplitude response profiles that are then gridded. Depth slices are cut through the gridded data, to create plan view maps of the investigation area at varying depths. Color contour maps of the gridded GPR data at 0.10m intervals are presented in **Appendix A**.

3.2 GPR Analysis

GPR anomalies seen in the data correspond to differences in electrical properties in the surrounding soil. The suspected graves may retain more moisture and also have a contrasting composition to the surrounding soil. This contrast in soil conductivity is the response seen in the data. As time passes and materials deteriorate, the contrast of the burial with the surrounding soil decreases.

After processing was applied to the data, each GPR profile was examined for grave like features. The criteria used to pick potential graves included hyperbola depth of at least 0.5 m and hyperbola widths of at least 1.0 m. When identified, these features were marked on the profiles. Adjacent profiles were examined anytime a potential grave was seen in the data to confirm that the potential grave was visible on at least two, and preferably three adjacent profiles and maintained the same depth. Only features that met the criteria within the profile data were used to discern potential grave locations.

Figure 3 illustrates the expected profile signature of an intact modern grave, created by a GPR response simulator. Boxlike reflectors in the subsurface with tails coming off either side is representative of the kind of features marked in the profiles. Pristine grave responses like **Figure 3** were not observed within the Union Baptist Church cemetery.

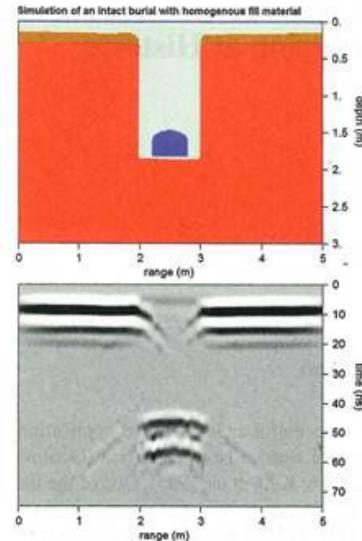


Figure 4: Modeled GPR data over intact grave site (Goodman, Piro 2013)

For the Union Baptist Church Cemetery, NAEVA examined the data in profile and picked hyperbolas that fit the criteria for “grave-like features”. Features were noted, keeping in mind the signals in the subsurface possibly related to tree roots, rocks, etc.

Figure 5 below shows an example of response over a potential burial. The width of the hyperbola, depth below ground surface, and presence of responses like this on adjacent lines are used to differentiate potential burials from other subsurface reflectors.

Interpretation of GPR profiles can be challenging in areas where tree roots and subsurface reflectors other than the target (i.e. rocks) are present. An alternative way to view GPR data is to create depth slices, which displays amplitude of the return signal at particular depths.

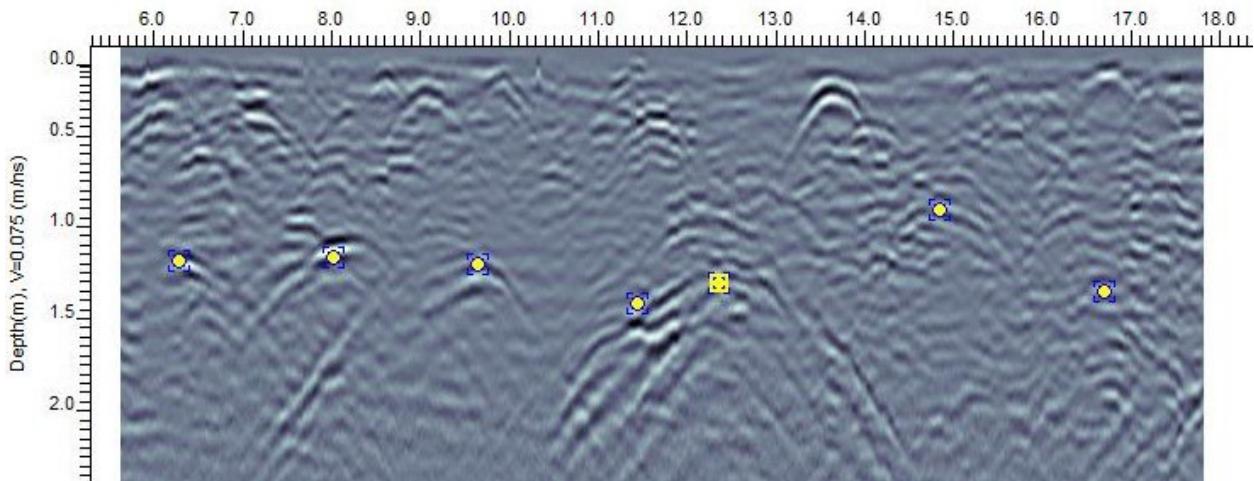


Figure 5: An example of interpreted profile grave responses in the Union Baptist Church Cemetery

The GPR data were gridded and contoured, and are displayed in **Appendix A**. Each slice has a thickness of 10 cm. The EKKO Project software provides a tool for estimating subsurface velocity, measuring hyperbolas in the data. Using the calculated velocity, the slices range from the surface (Slice 1) down to a maximum of 2.0 meters (Slice 19). Depths are shown at the bottom right-hand corner of each slice figure. **Appendix A**.

A grand total of 223 burials were interpreted from the data collected in both areas. In the larger of the two areas surveyed in this investigation, NAEVA interpreted 45 very high confidence potential burials, 91 high confidence, 66 medium confidence, and 3 low confidence burials. In the smaller area to the northeast, 2 very high confidence, 5 high confidence, 6 medium confidence, and 5 low confidence burials were interpreted from the GPR data. Maps showing the locations of interpreted graves for each of the two areas can be found in **Appendix A**.

The GPR slices show many of the anomalies that have been interpreted as graves, but is most useful in showing general trends rather than to select individual burials. In the slices from approximately 0.6 meters to 2.25 meters in depth, the more recent, marked graves show responses visible in the contour maps. Many of the interpreted burials are best seen in the GPR profiles, rather than the slice view contour maps, due to more subtle

responses. High amplitude responses are very likely the result of burial vaults in the subsurface. Stone field marker locations were recorded with high accuracy GPS but many have no associated responses interpreted to be burials. This may be a result of the stones being naturally occurring rather than markers, or due to movement from their placed locations, or possibly due to high decay of the burial and lack of response visible to the GPR system.

6 CONCLUSIONS

GPR data was interpreted to show a total of 223 burials in the two areas surveyed in the Union Baptist Church Cemetery. The graves are spread throughout both of the survey areas, indicating a large number of unmarked burials.

Graves over which data were collected in the Union Baptist Church Cemetery are presumed to have varying ages and states of decay. Intact coffins offer a higher contrast, as an air-filled cavity has greater contrast with the surrounding soil. Collapsed coffins offer much less contrast. Some graves have more detectable response due to a higher degree of preservation, while others are likely nearing or have reached the point where a high degree of decay has left little to create a discernable response. In some cases, the level of decay may be such that the burials are not detectable to geophysical methods.

7 REFERENCES

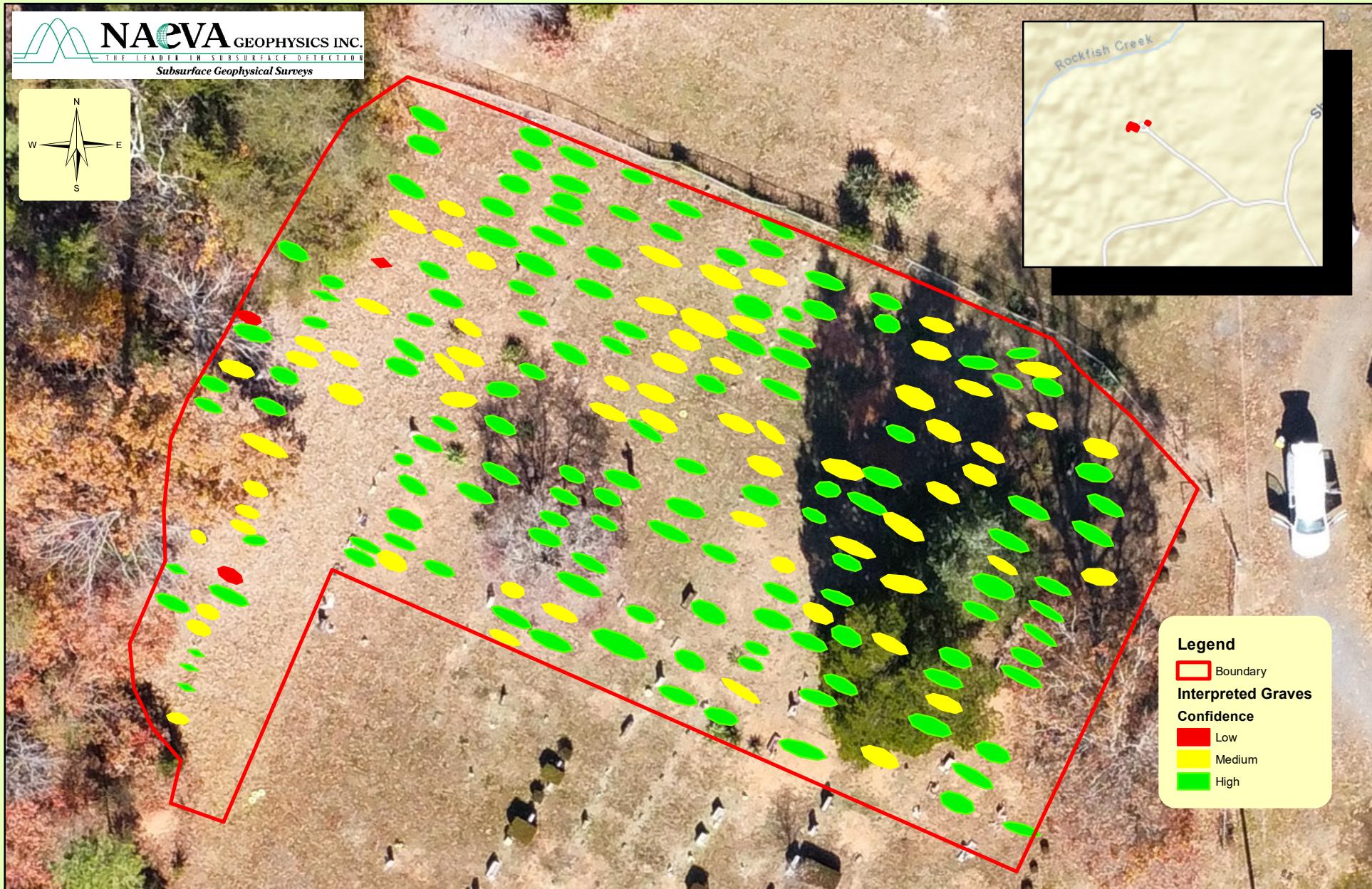
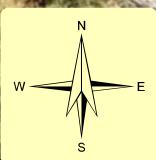
Goodman, Dean, Piro, Salvatore, GPR Remote Sensing in Archaeology, 2013

Appendix A

Union Baptist Church Cemetery

- Interpretation Maps
- GPR Slices

Union Baptist Church Cemetery GPR



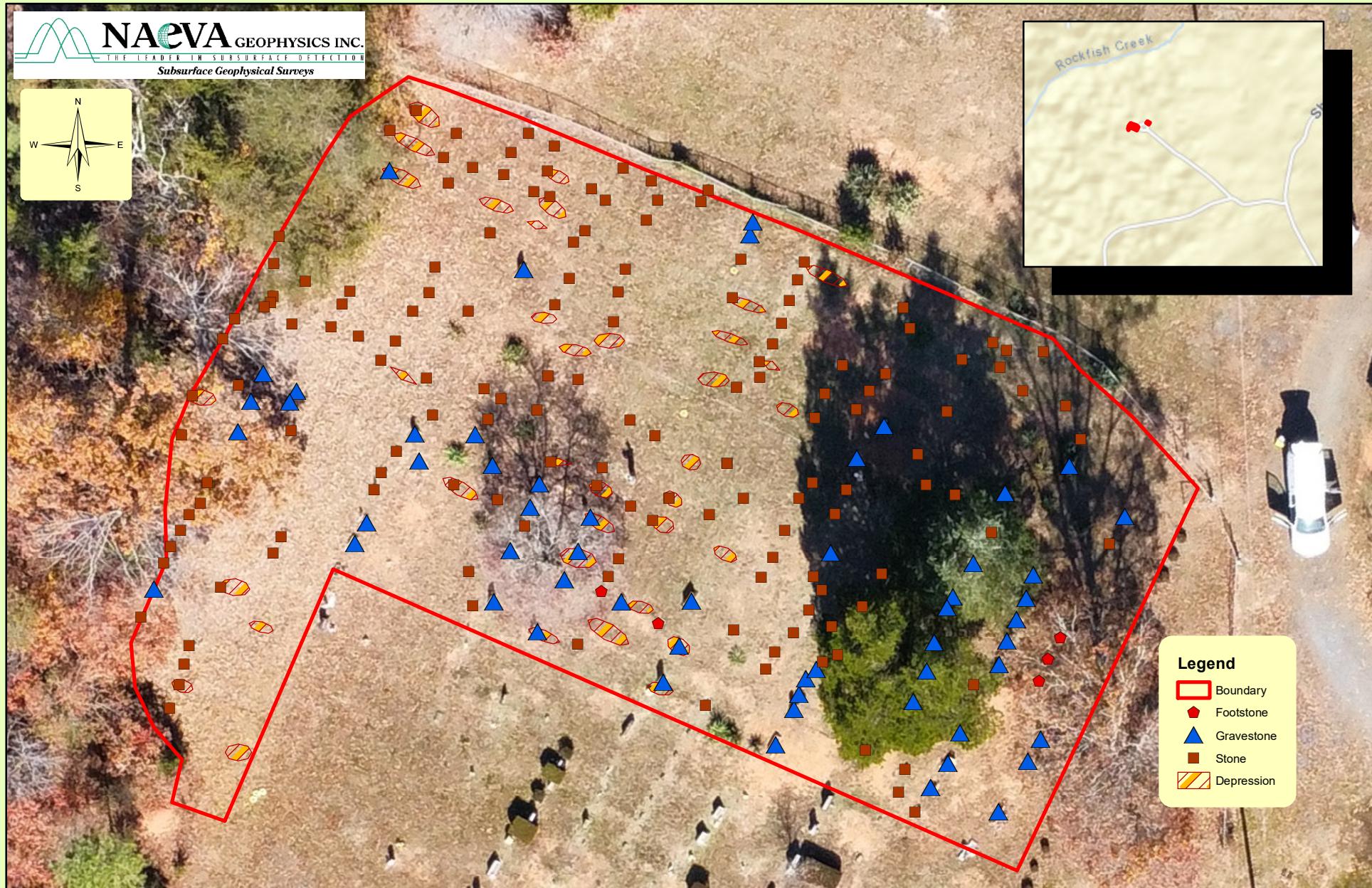
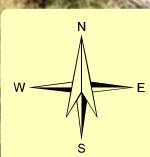
0 3 6 12 18 24 Meters

Main Cemetery

Interpretation

Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



Legend

- Boundary
- Footstone
- Gravestone
- Stone
- Depression

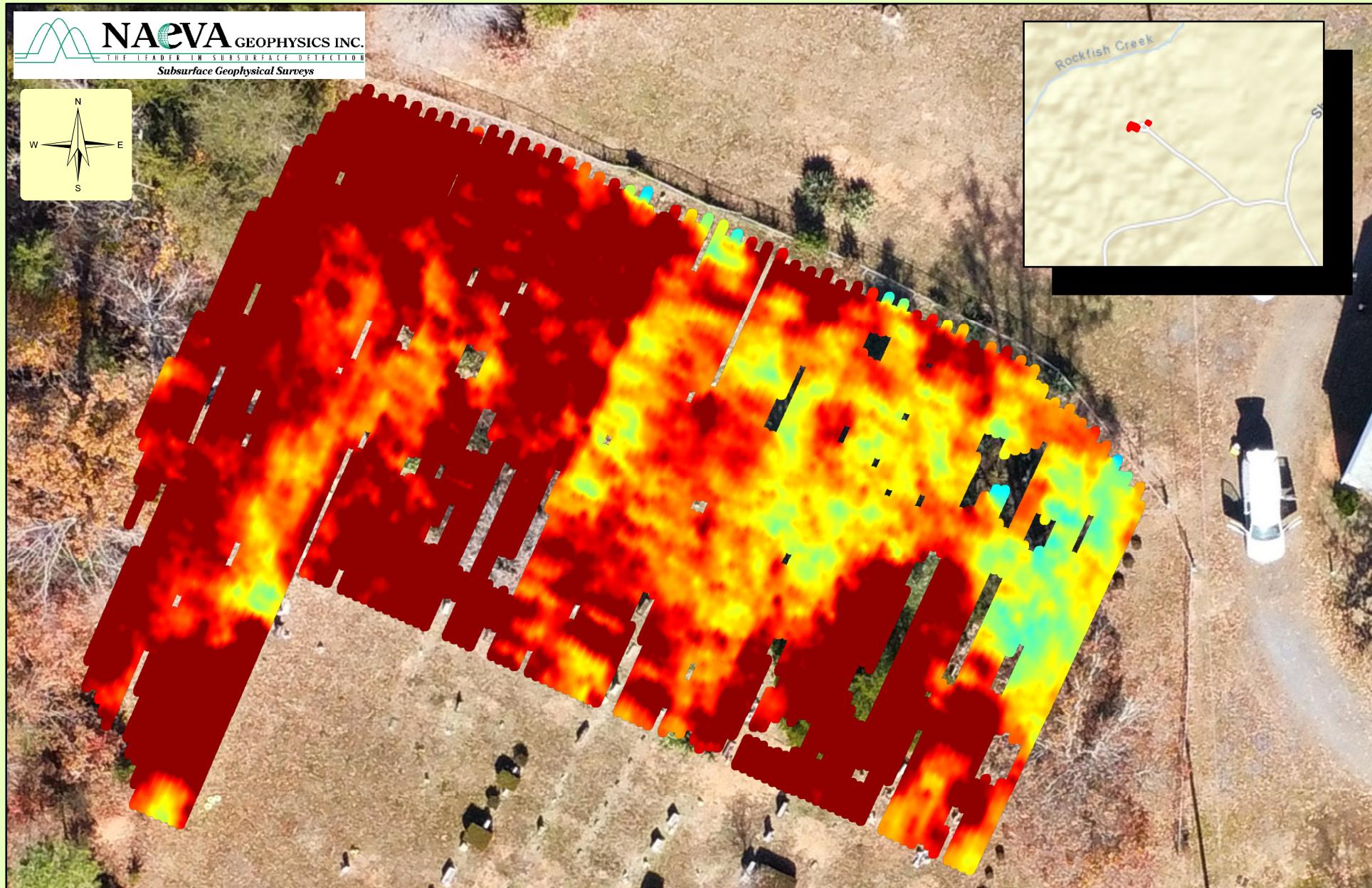
0 3 6 12 18 24 Meters

Main Cemetery

Surface Features

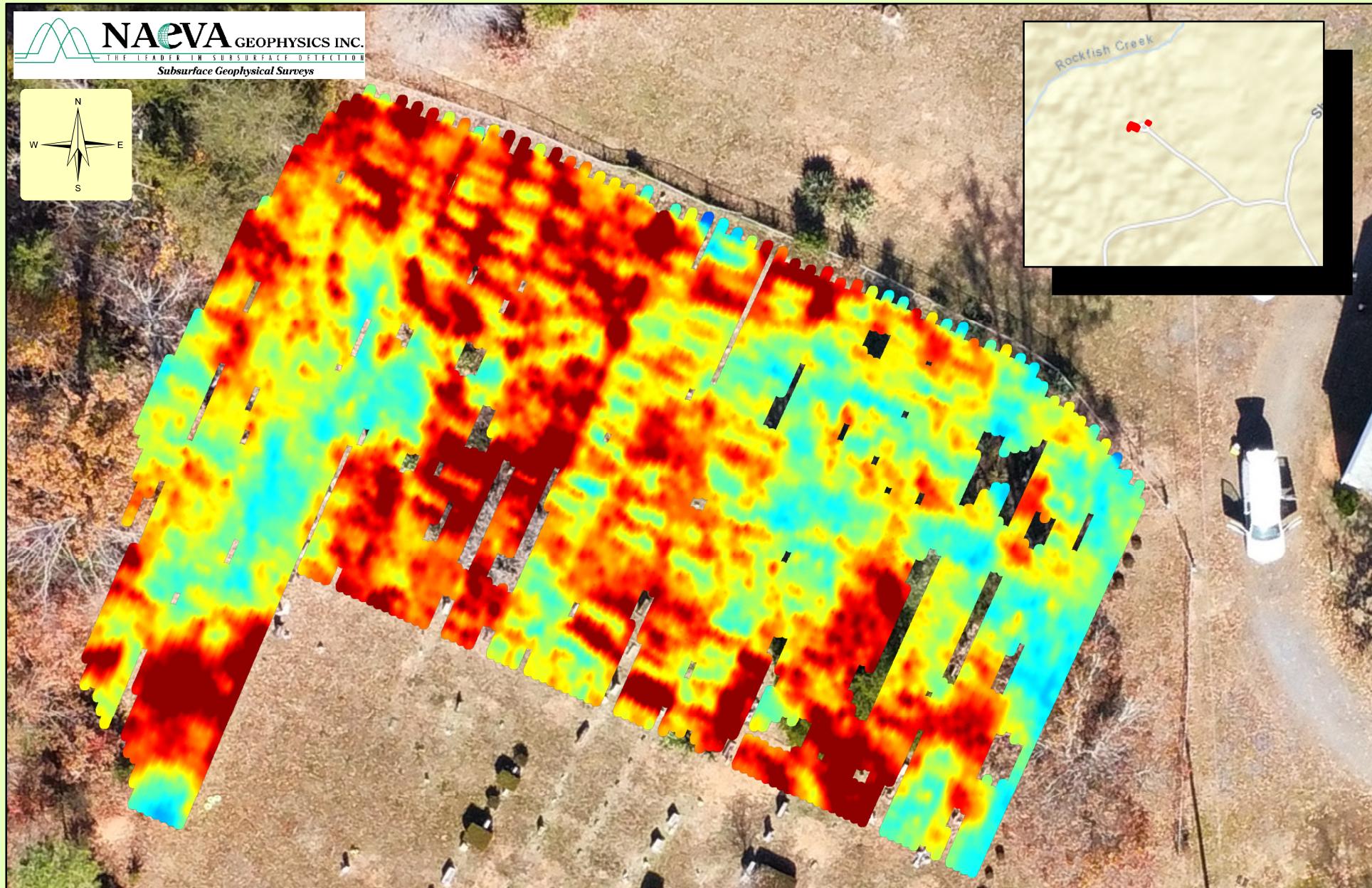
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



Main Cemetery
Slice 0 [0-10cm]
Date of map creation: 10 November 2023 Date of Survey: 6-8 November 2023

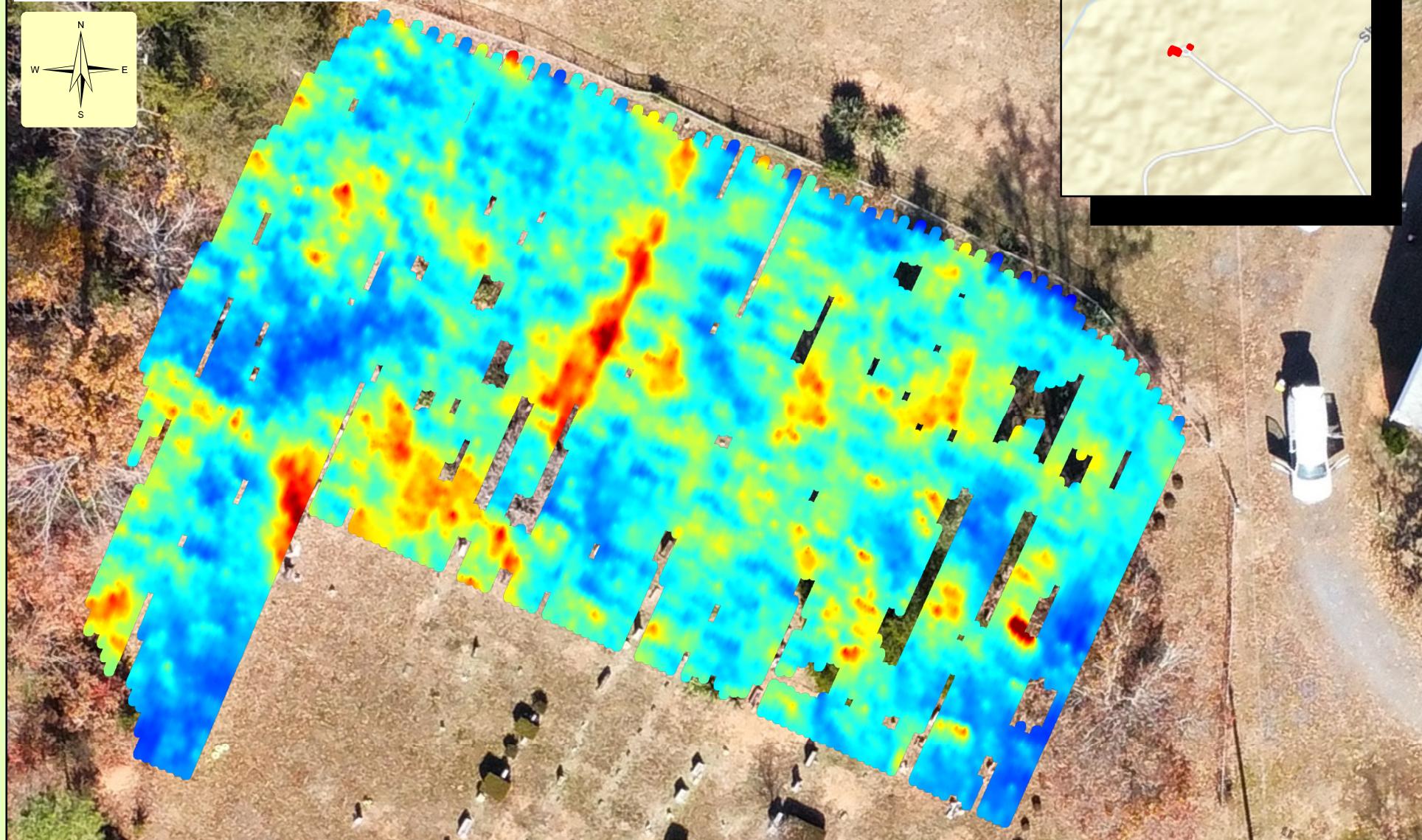
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 1 [10-20cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

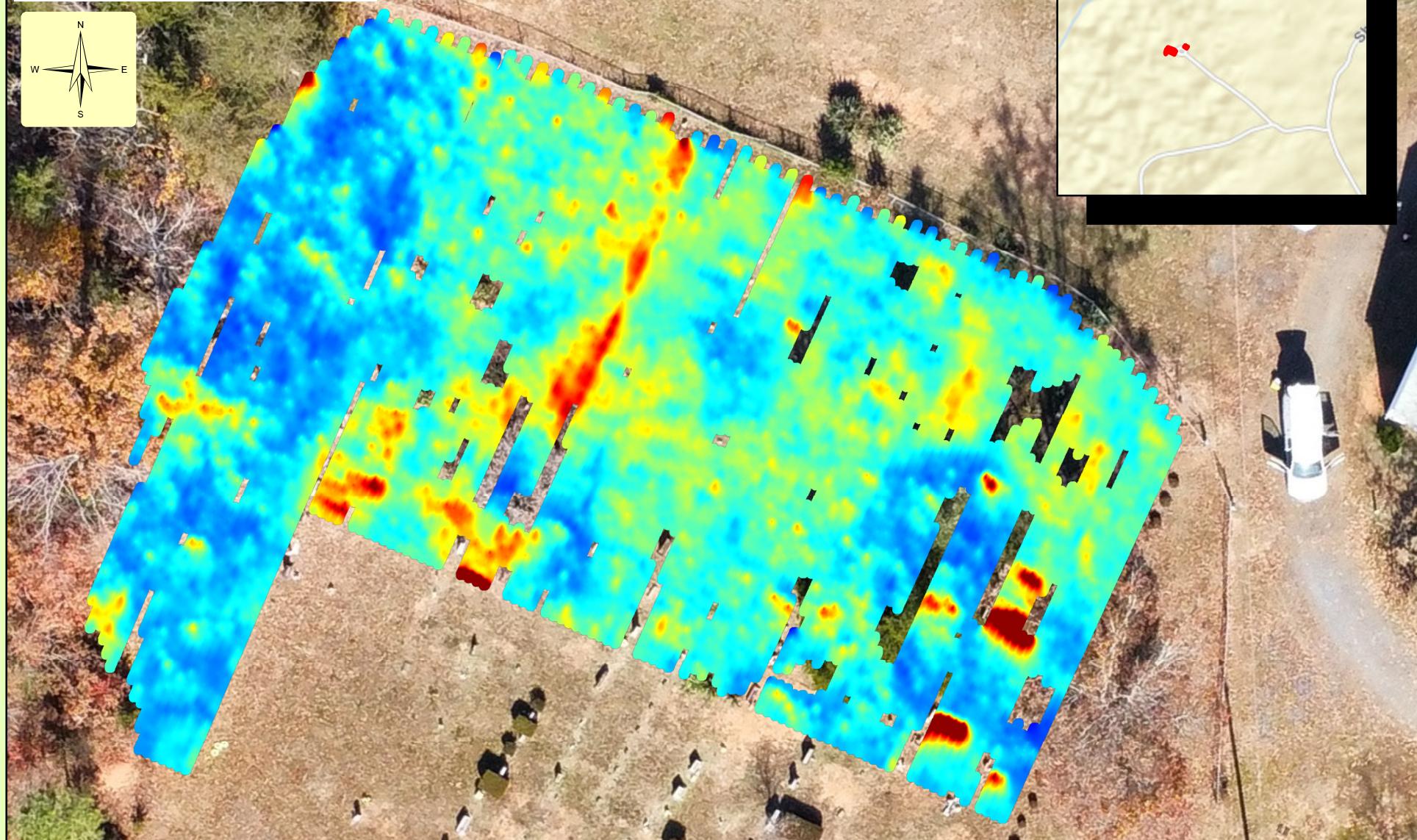
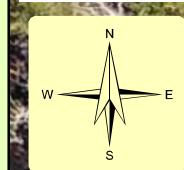
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 2 [20-30cm]
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Date of Survey: 6-8 November 2023

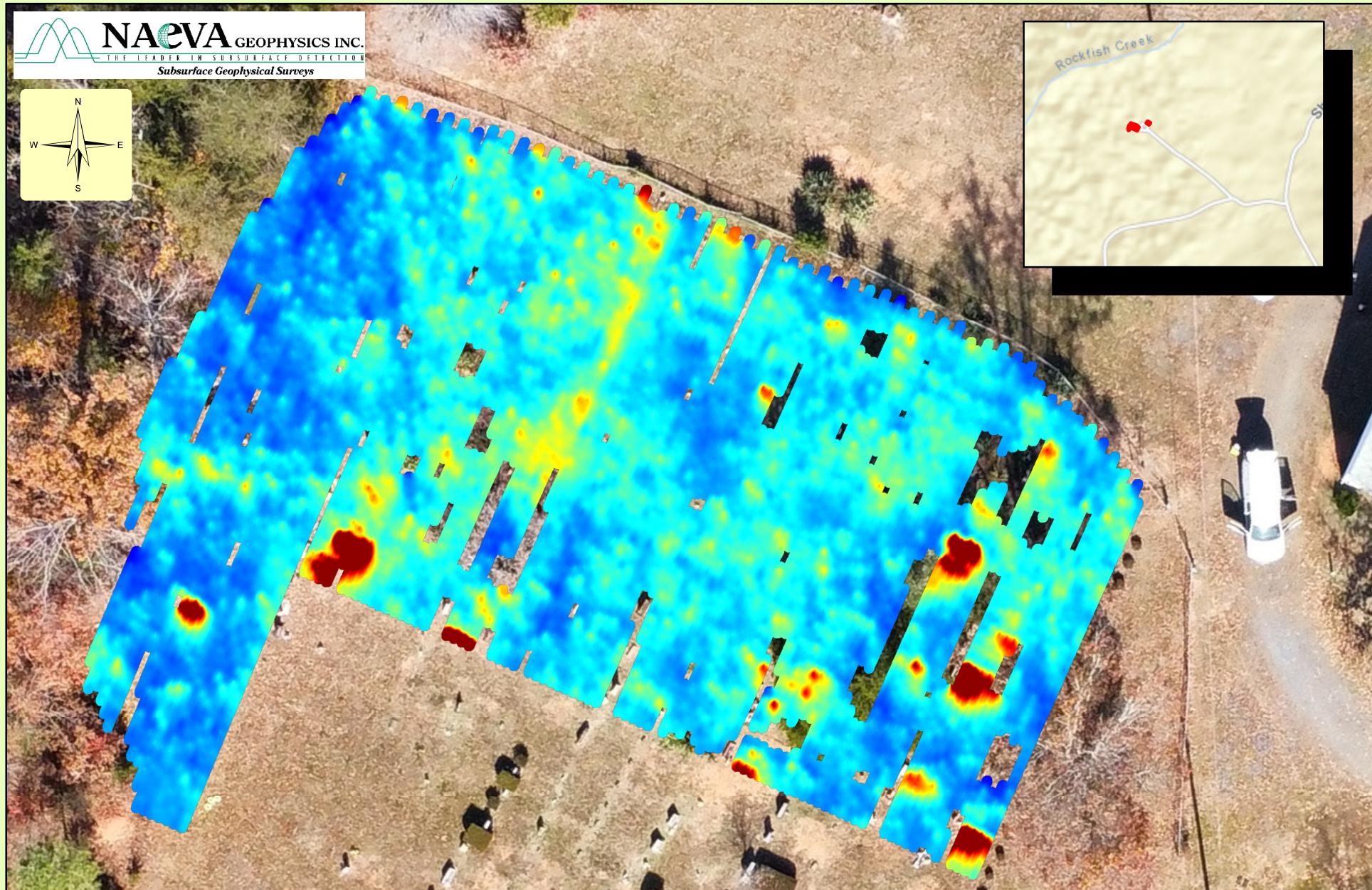
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 3 [30-40cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



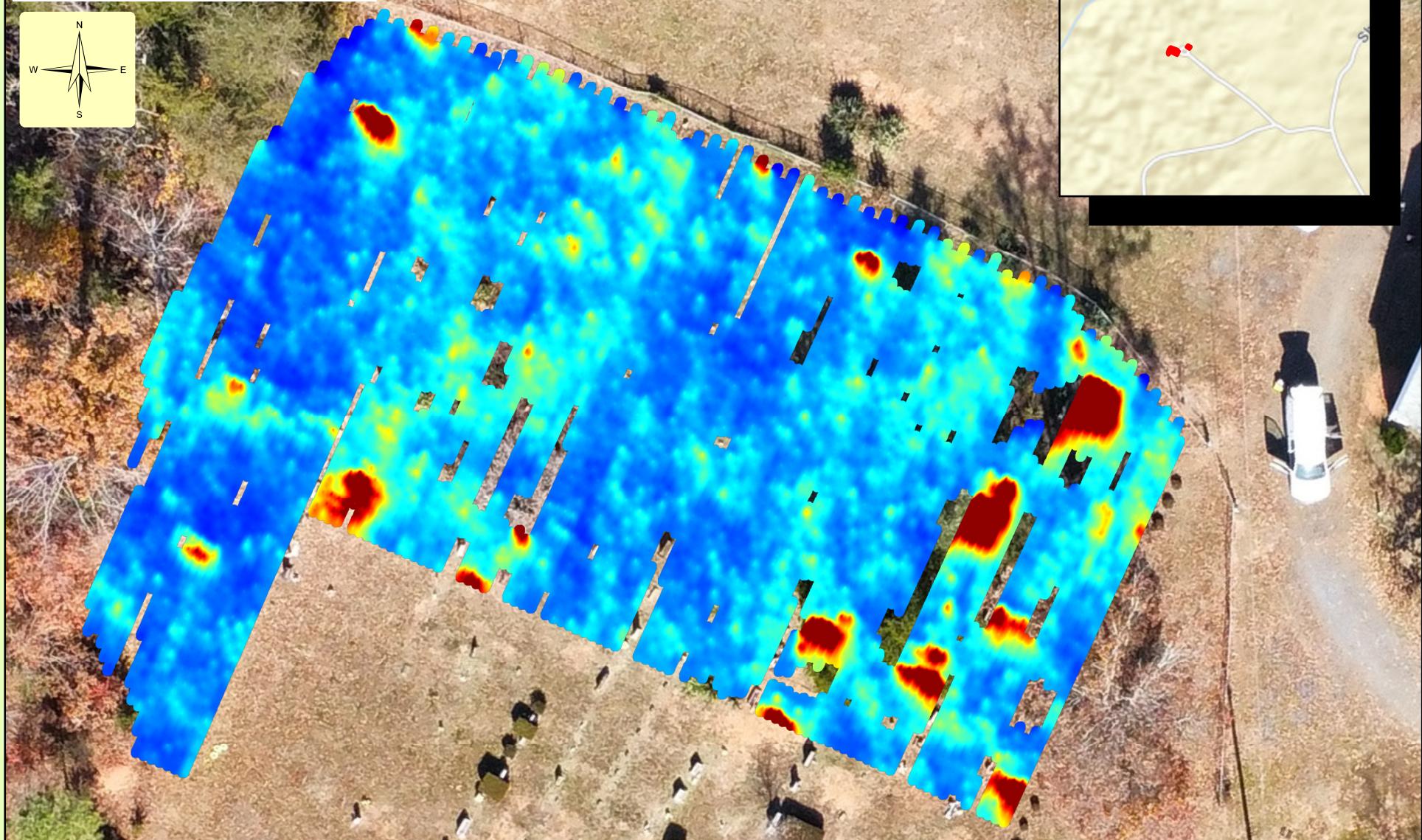
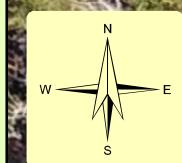
Main Cemetery

Slice 4 [40-50cm]

Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

0 3 6 12 18 24 Meters

Union Baptist Church Cemetery GPR



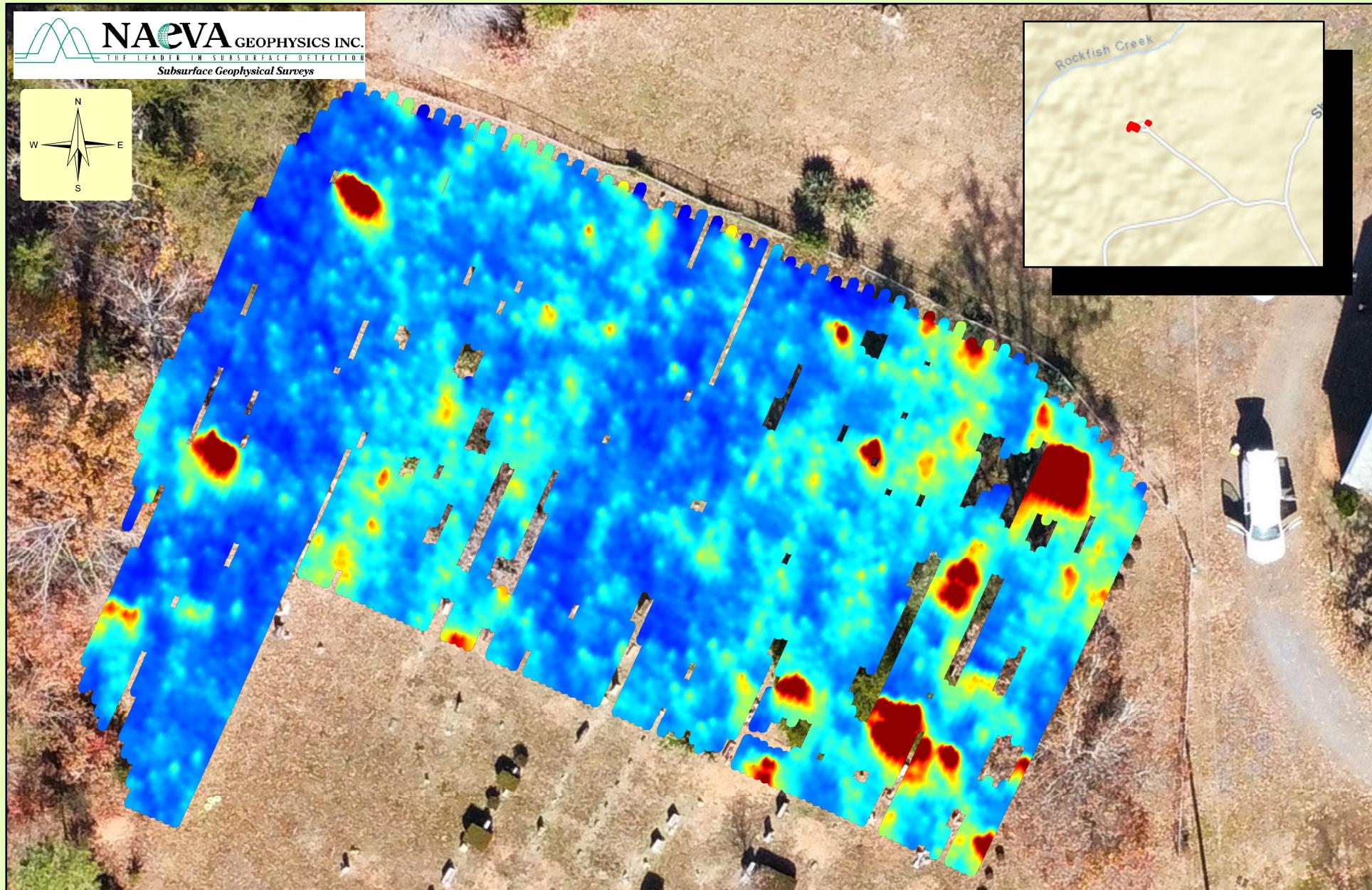
0 3 6 12 18 24 Meters

Main Cemetery

Slice 5 [50-60cm]

Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

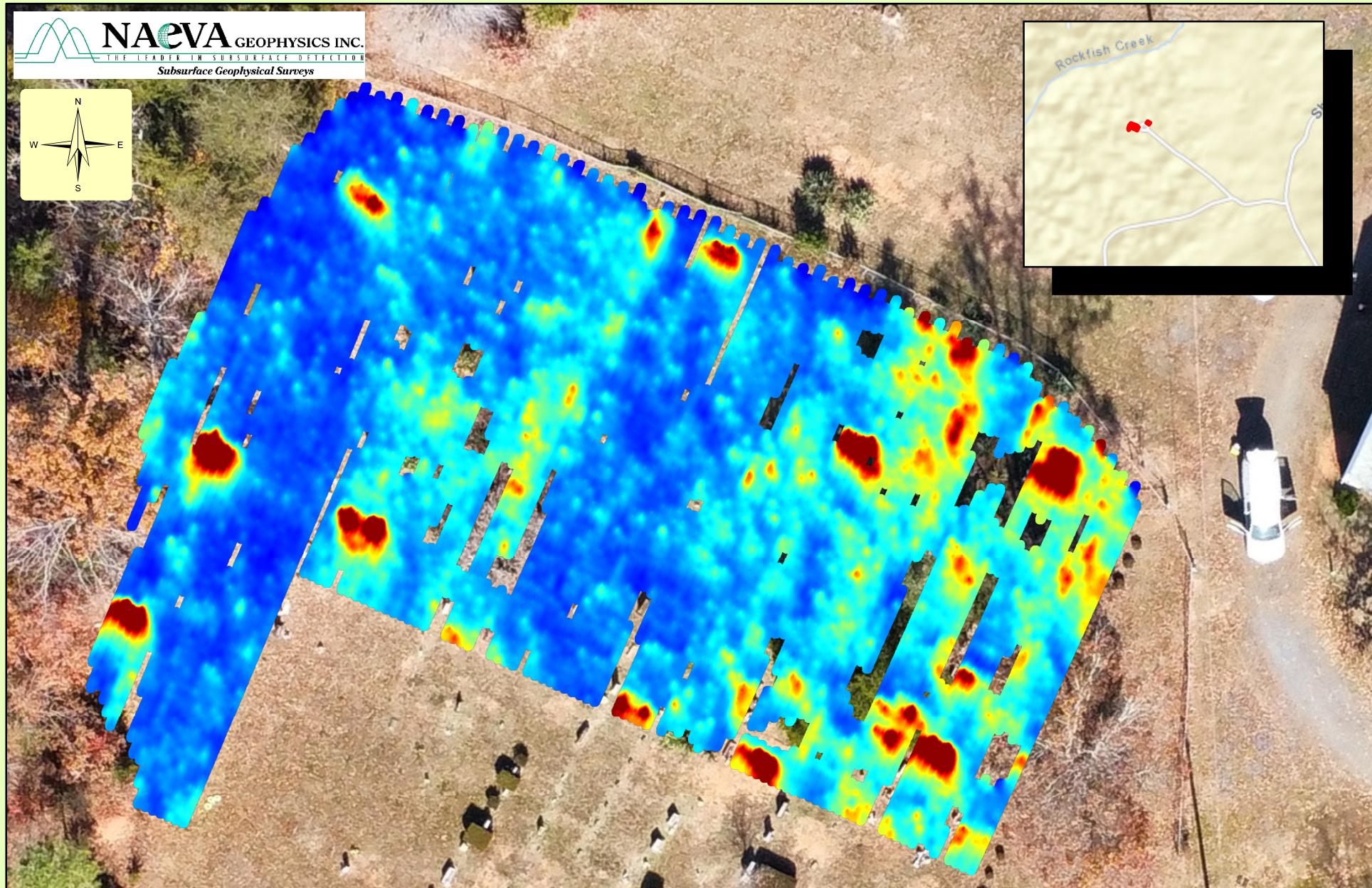
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 6 [60-70cm]
Date of map creation: 10 November 2023 Date of Survey: 6-8 November 2023

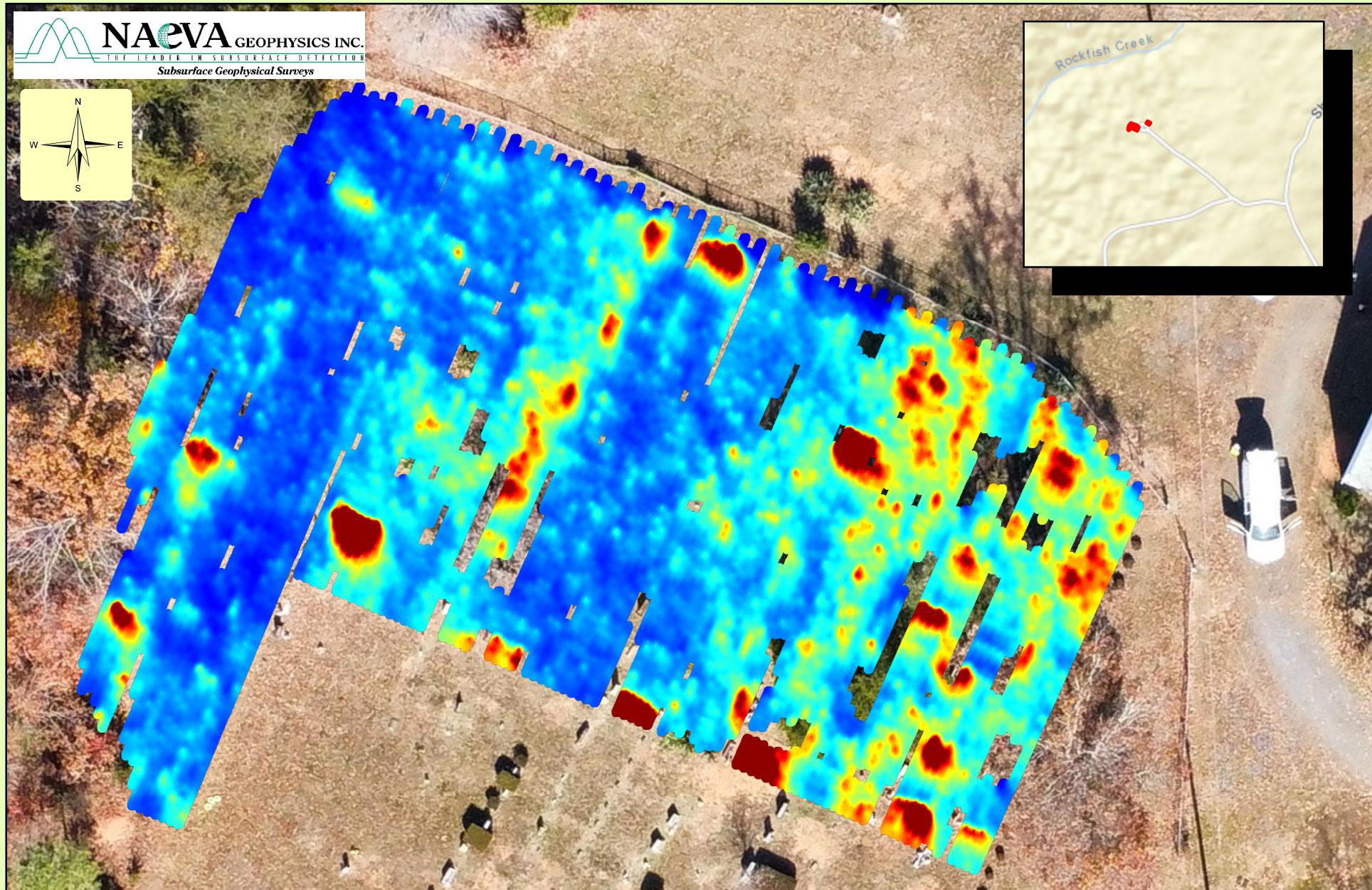
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 7 [70-80cm]
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Date of Survey: 6-8 November 2023

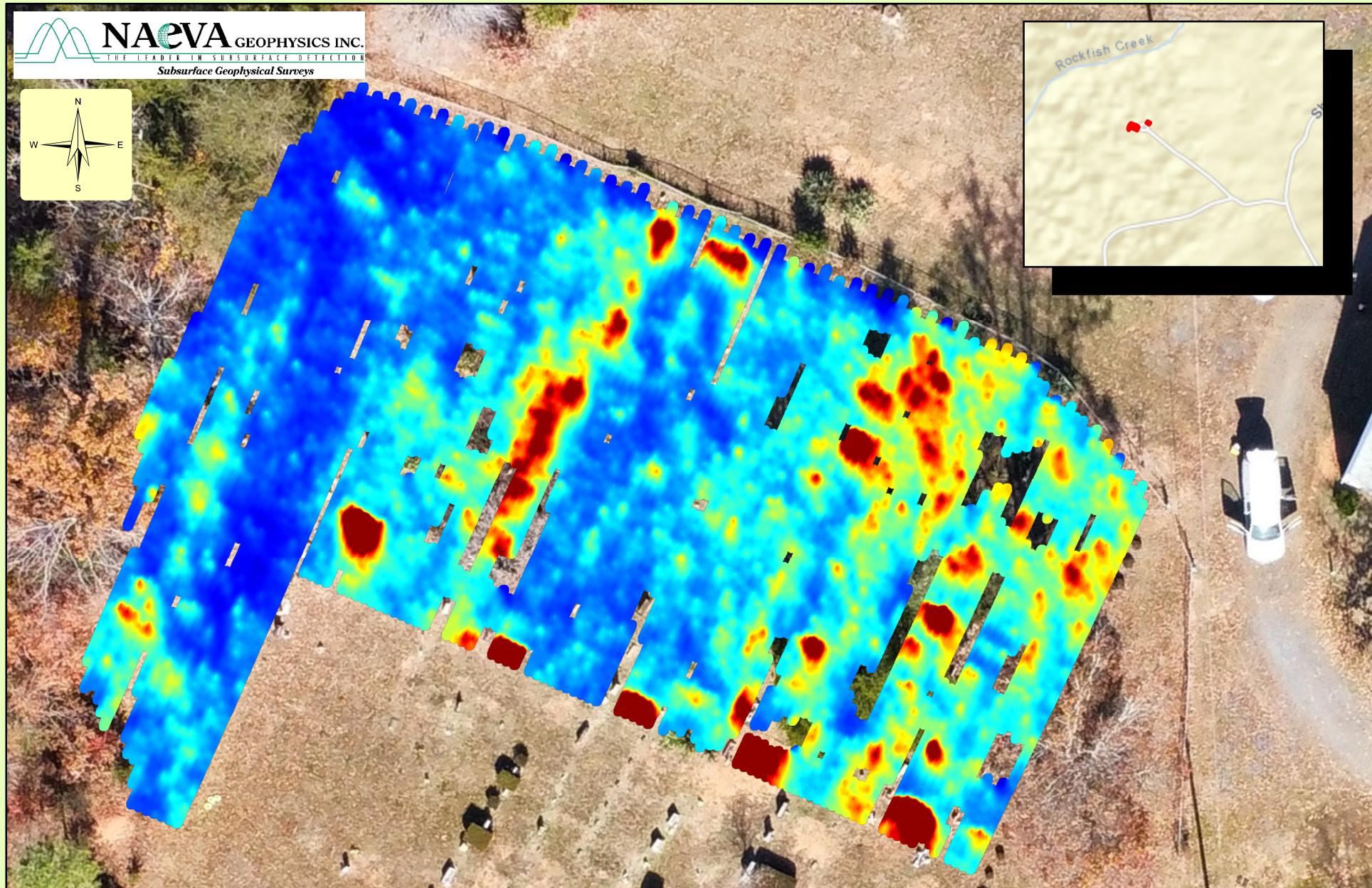
Union Baptist Church Cemetery GPR



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Main Cemetery
Slice 8 [80-90cm]
Date of map creation: 10 November 2023 Date of Survey: 6-8 November 2023

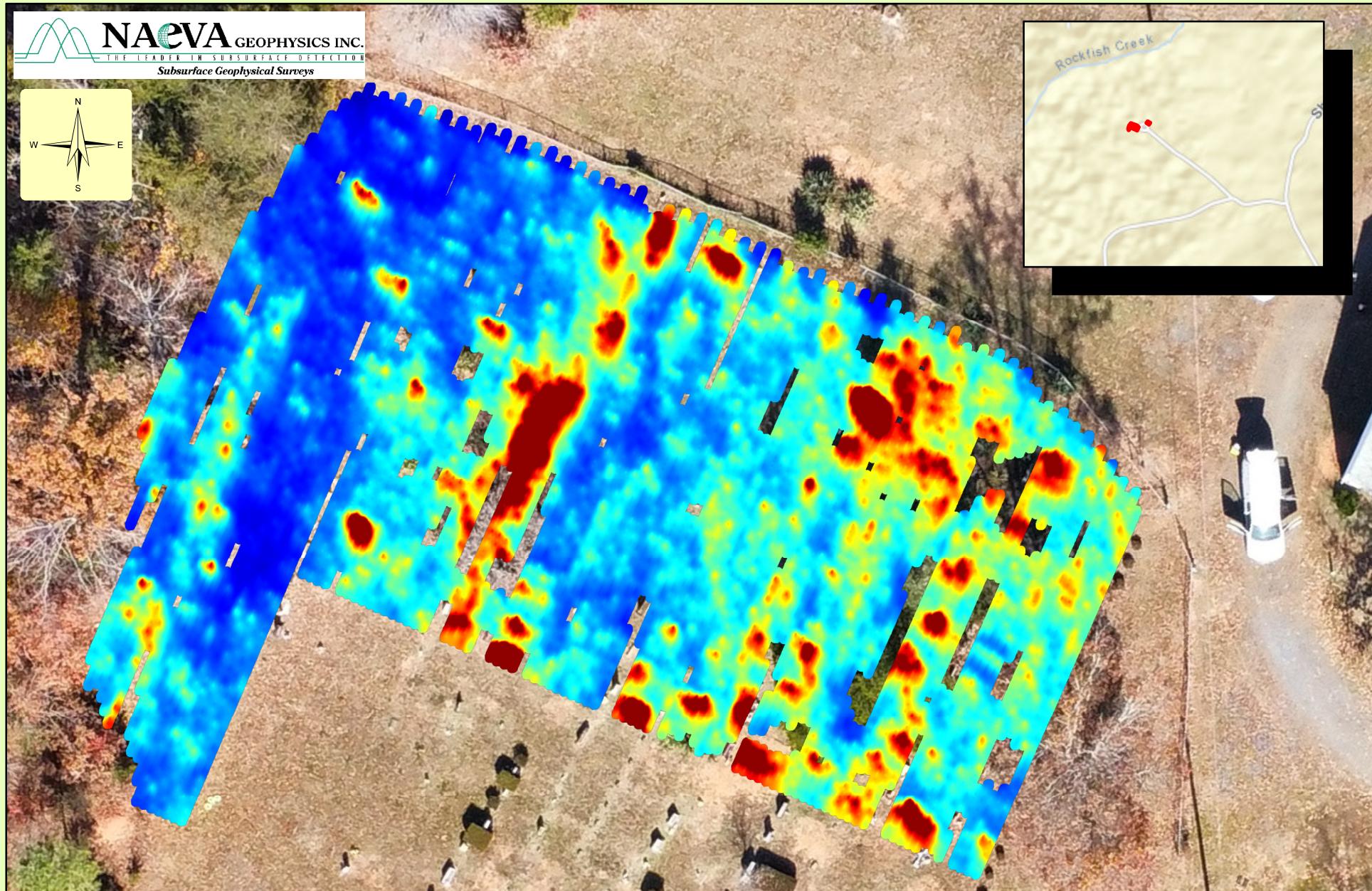
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 9 [90-100cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



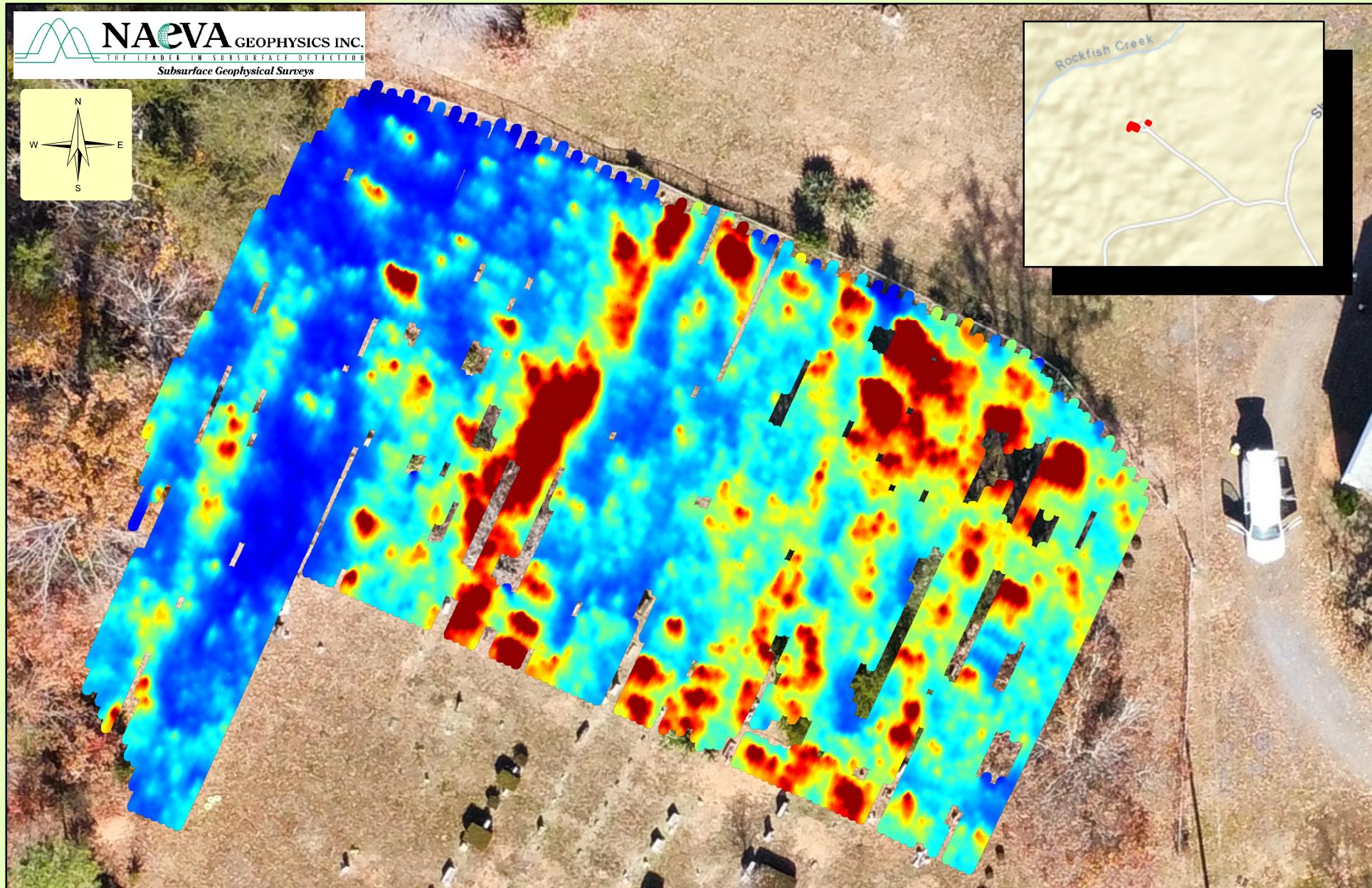
Main Cemetery

Slice 10 [100-110cm]

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Date of Survey: 6-8 November 2023

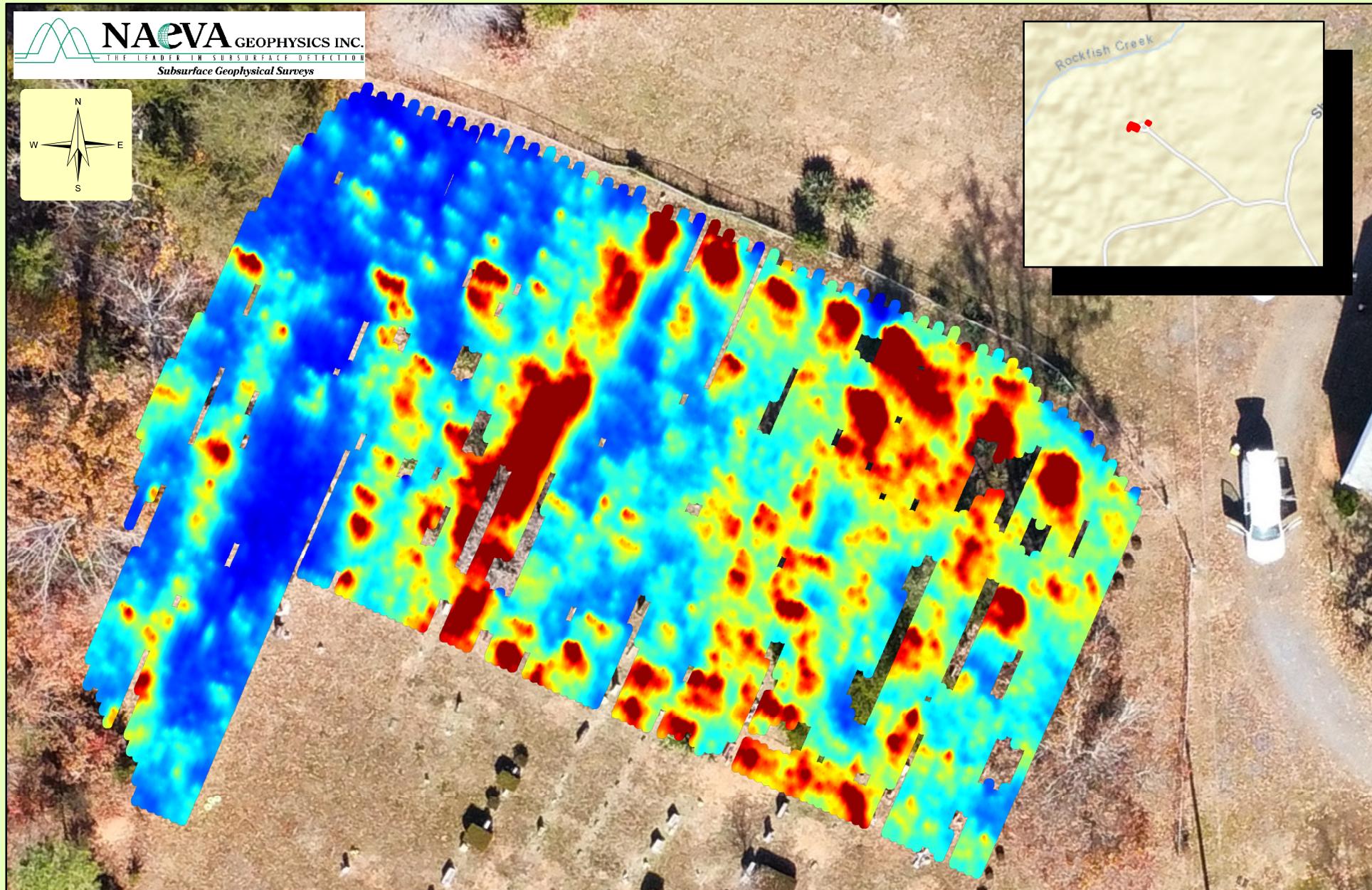
0 3 6 12 18 24 Meters

Union Baptist Church Cemetery GPR



Main Cemetery
Slice 11 [110-120cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

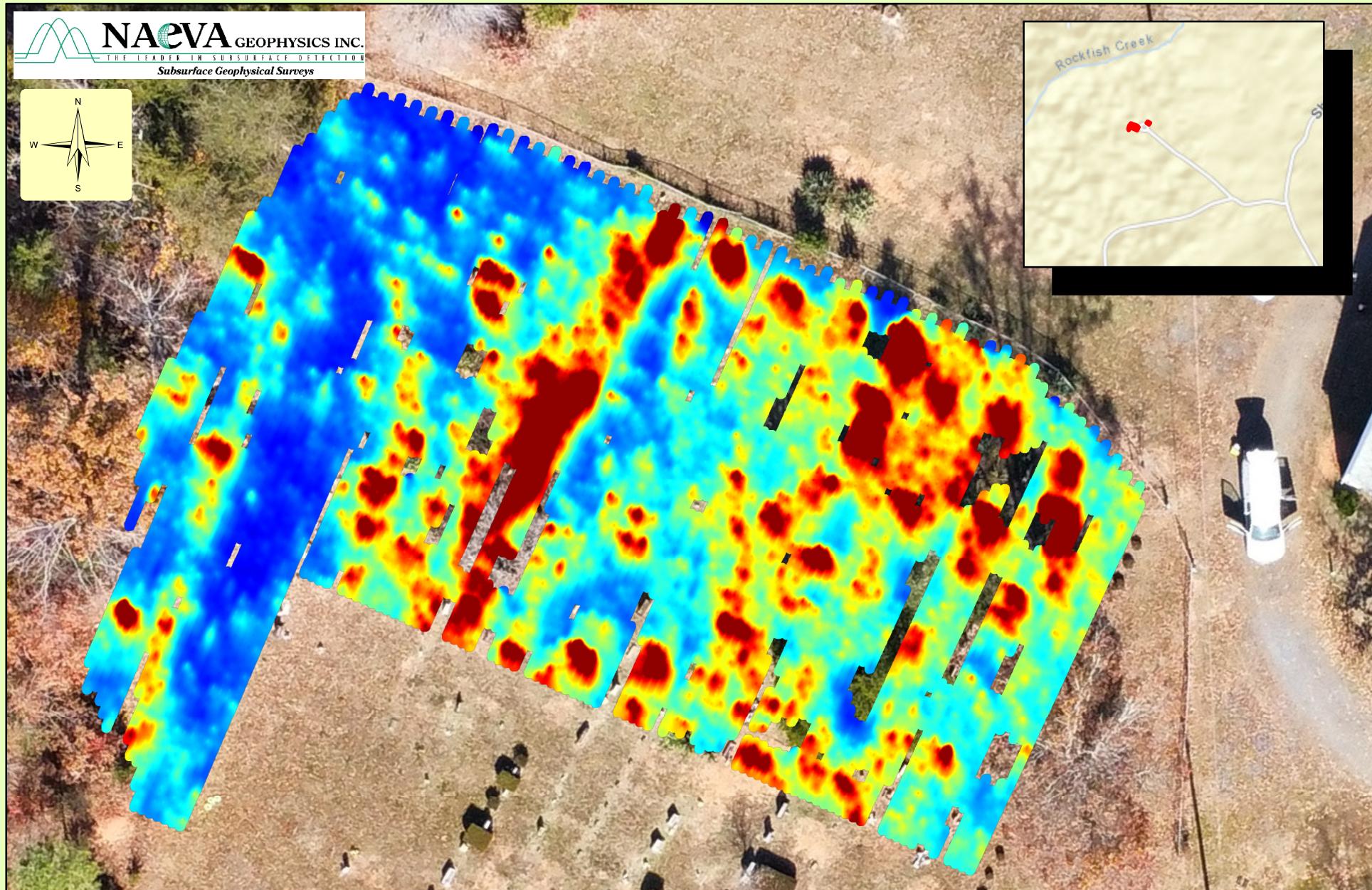
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 12 [120-130cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

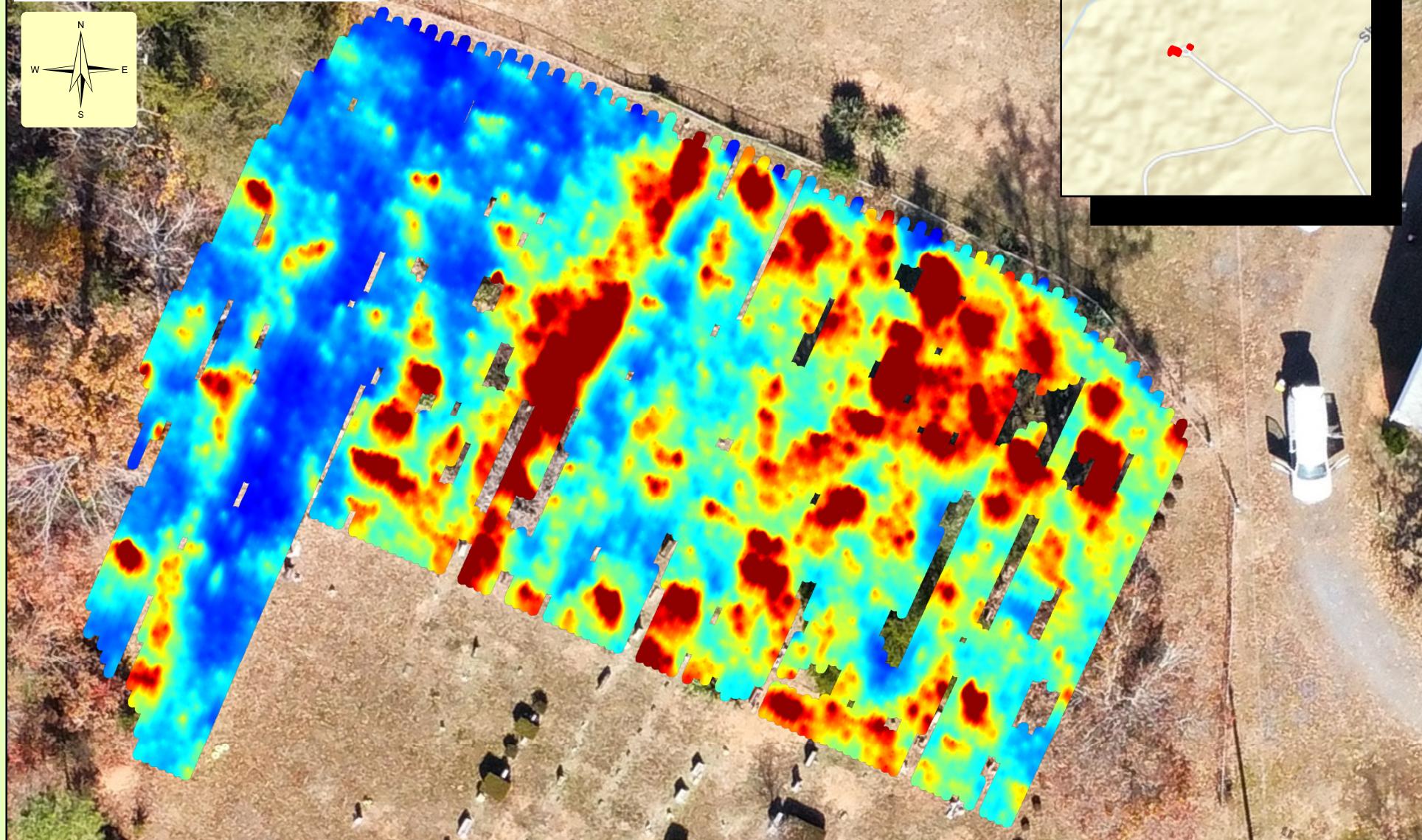
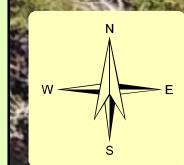
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 13 [130-140cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



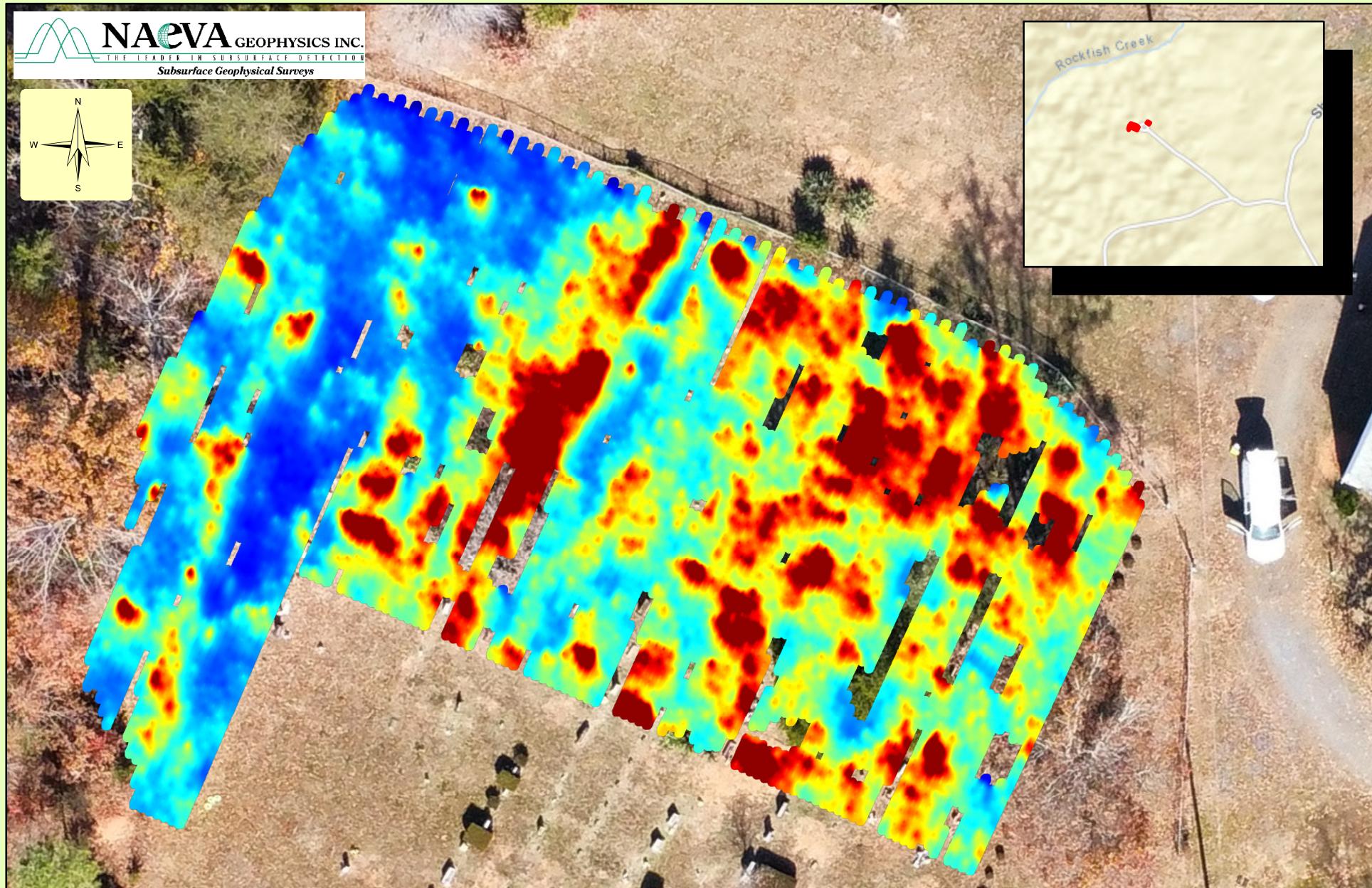
0 3 6 12 18 24 Meters

Main Cemetery

Slice 14 [140-150cm]

Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

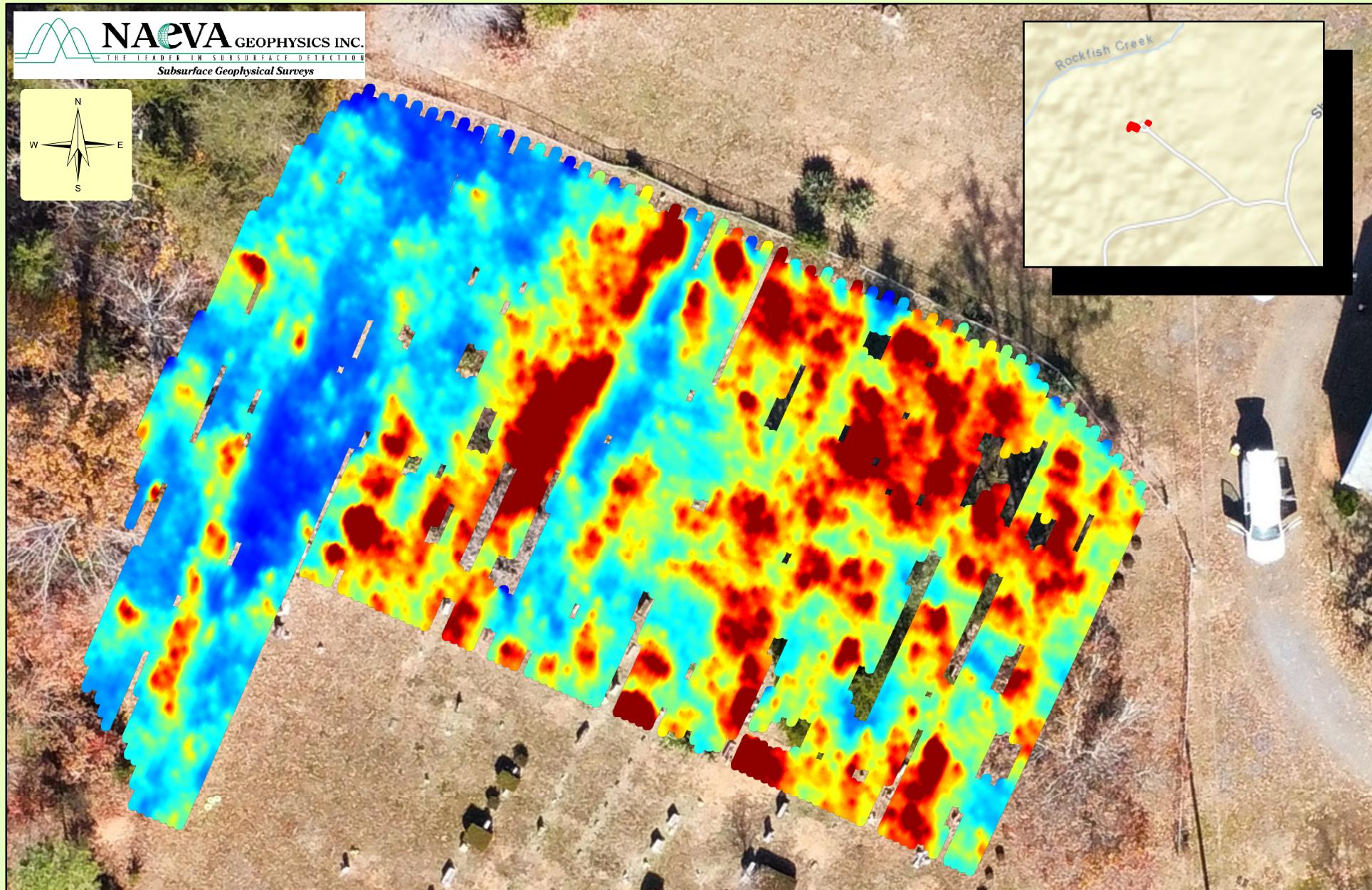
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 15 [150-160cm]
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Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



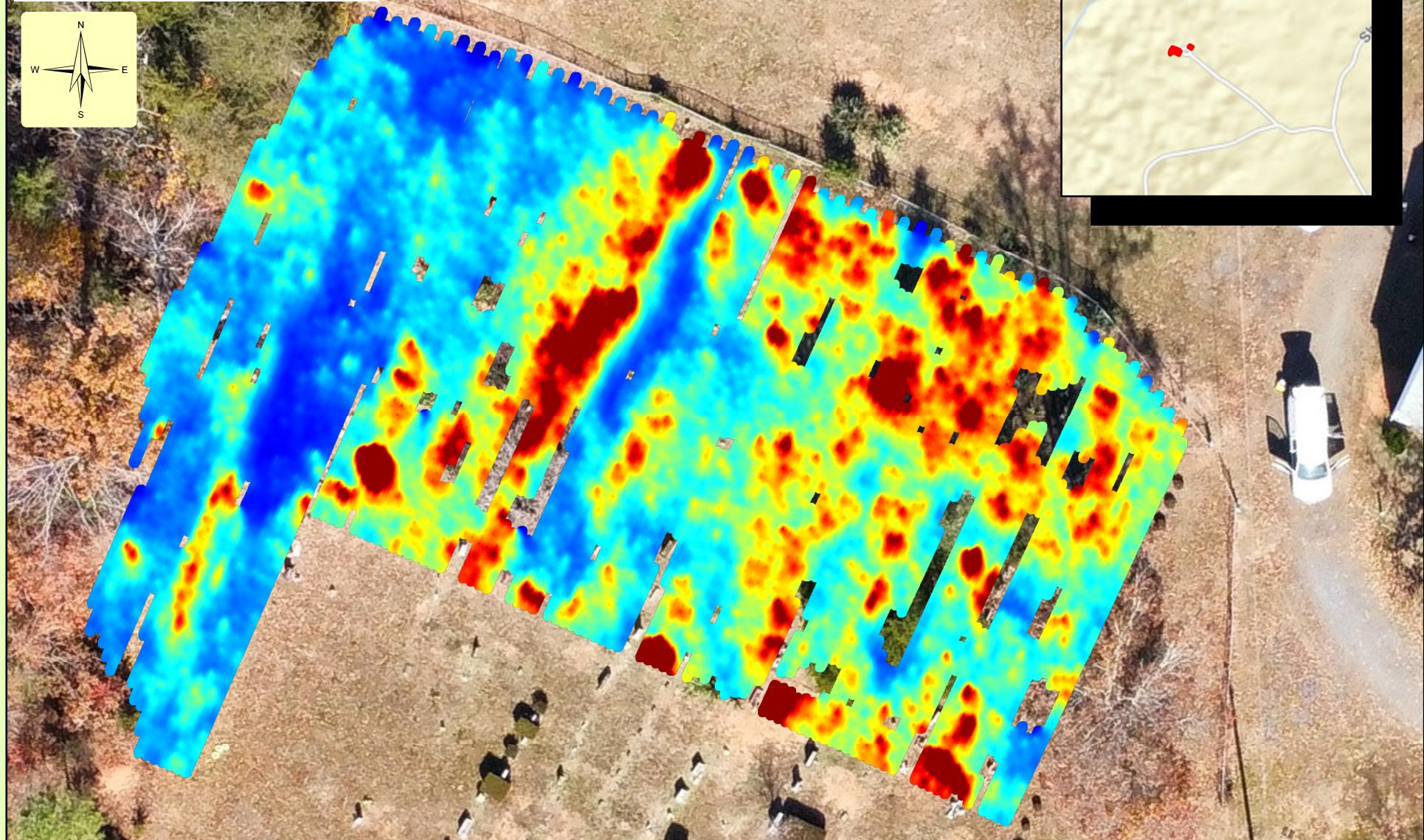
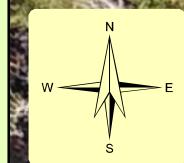
Main Cemetery

Slice 16 [160-170cm]

Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

0 3 6 12 18 24 Meters

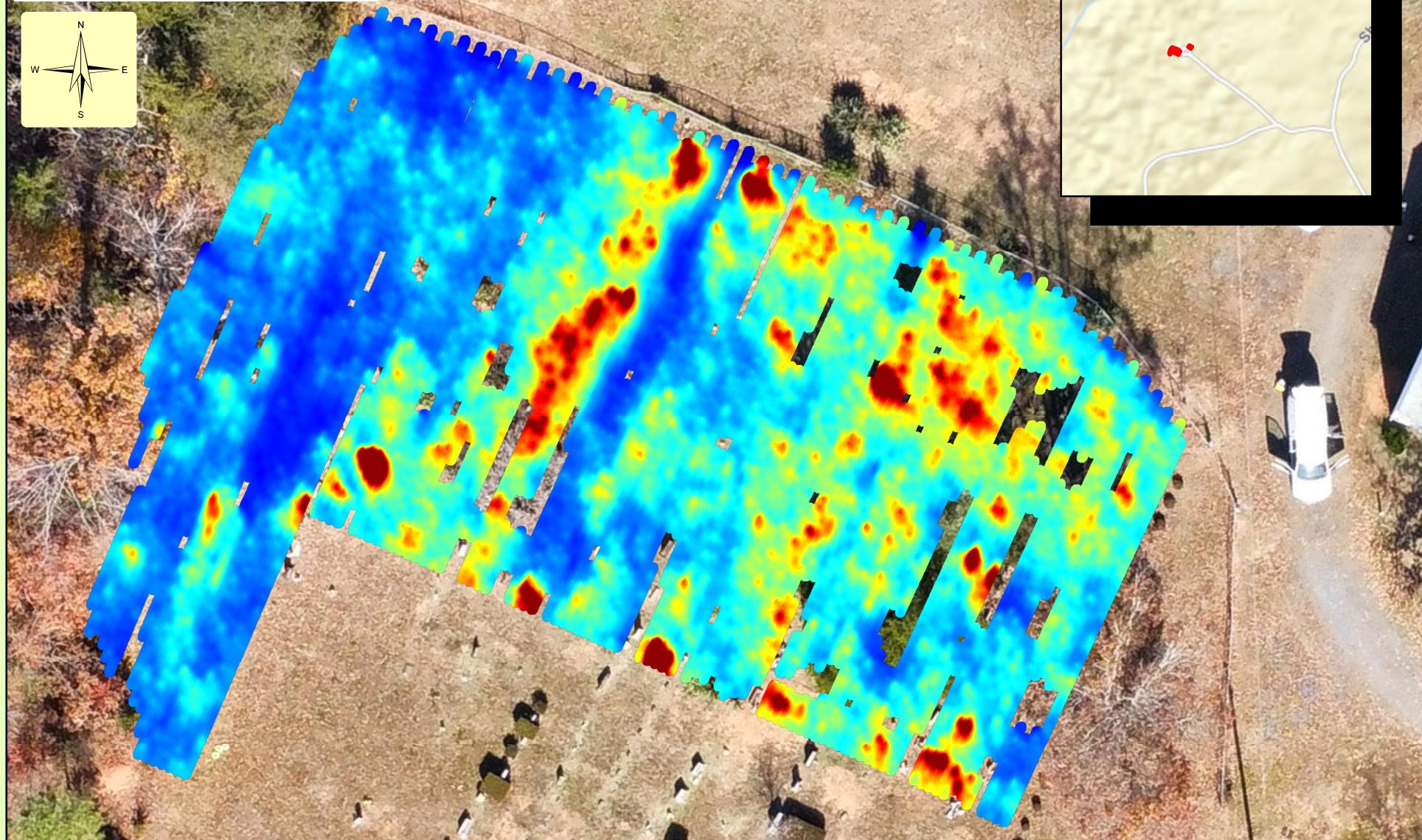
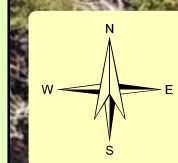
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 17 [170-180cm]
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Date of Survey: 6-8 November 2023

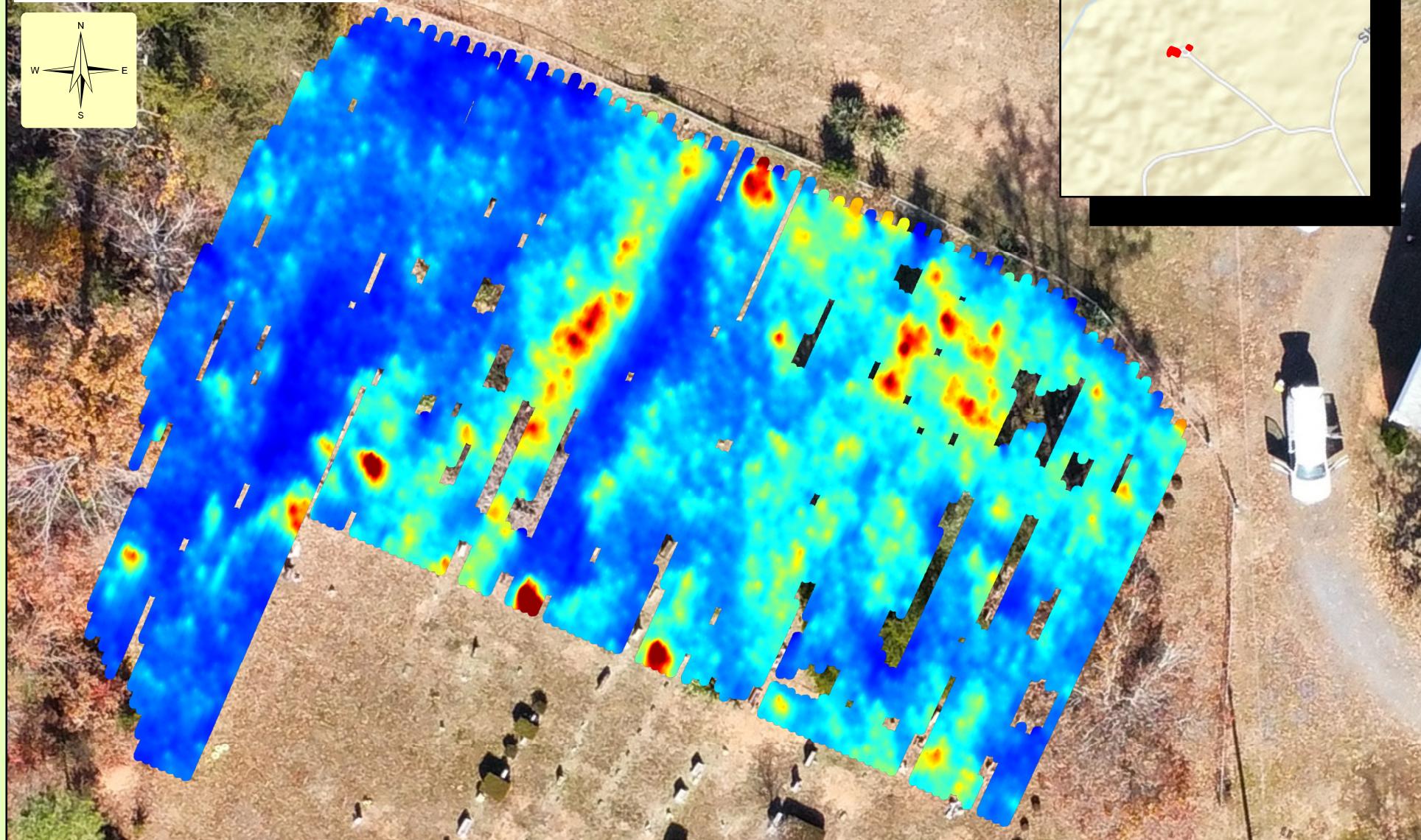
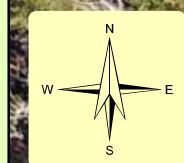
Union Baptist Church Cemetery GPR



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Main Cemetery
Slice 18 [180-190cm]
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Date of Survey: 6-8 November 2023

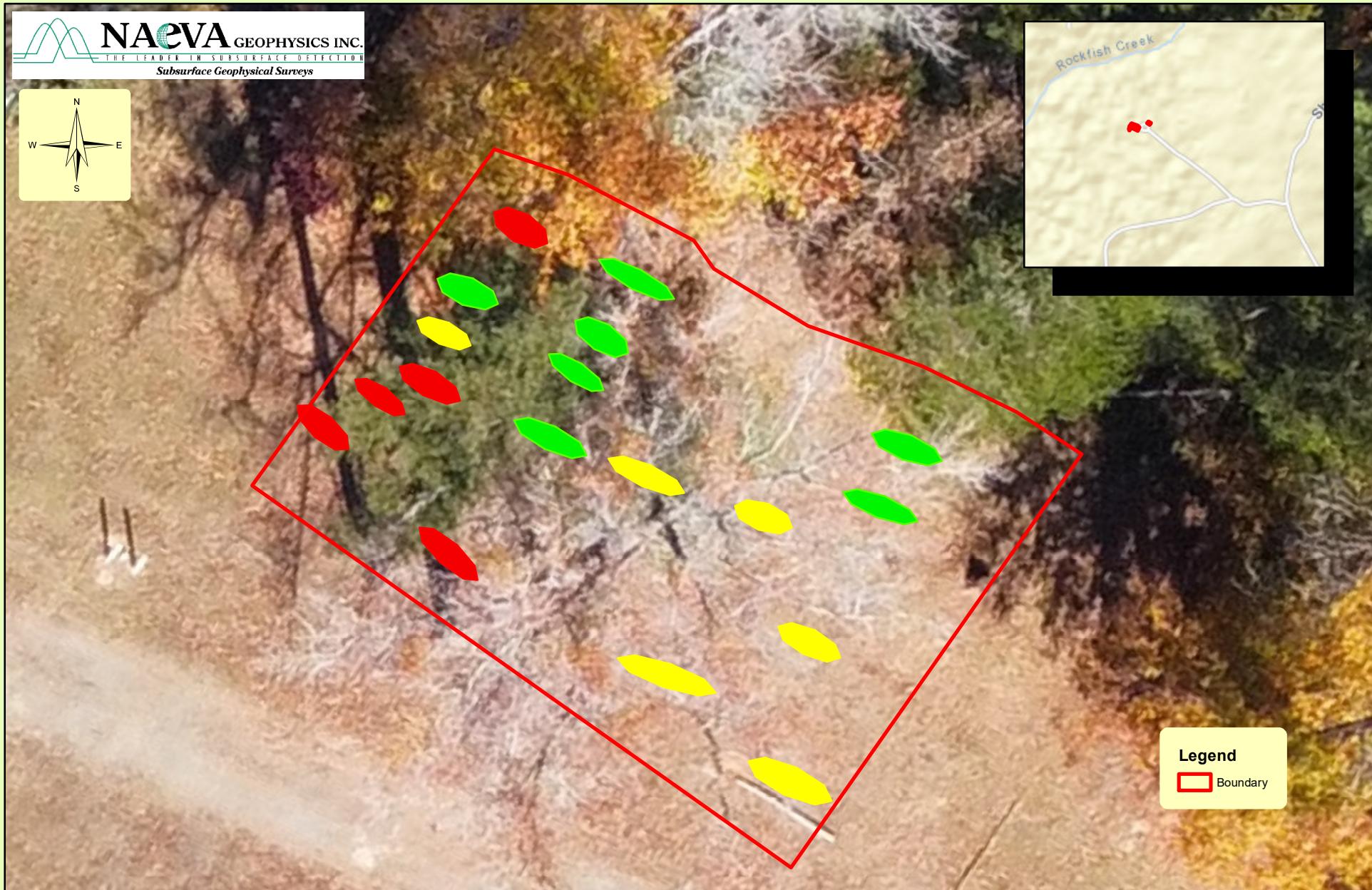
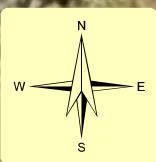
Union Baptist Church Cemetery GPR



0 3 6 12 18 24 Meters

Main Cemetery
Slice 19 [190-200cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR

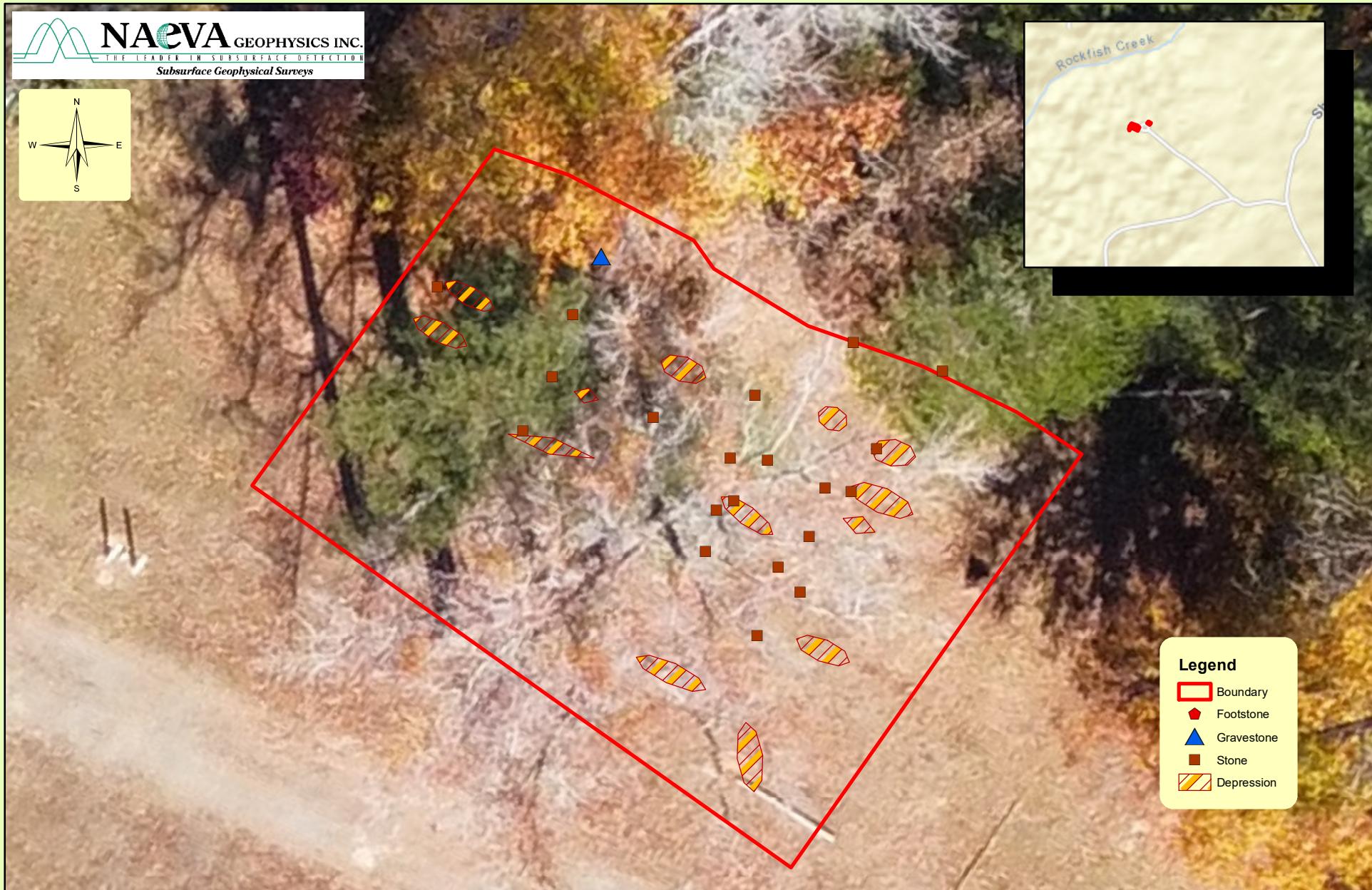


Legend
Boundary

0 1.5 3 6 9 12 Meters

Small Cemetery
Interpretation
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



Legend

- Boundary
- Footstone
- Gravestone
- Stone
- Depression

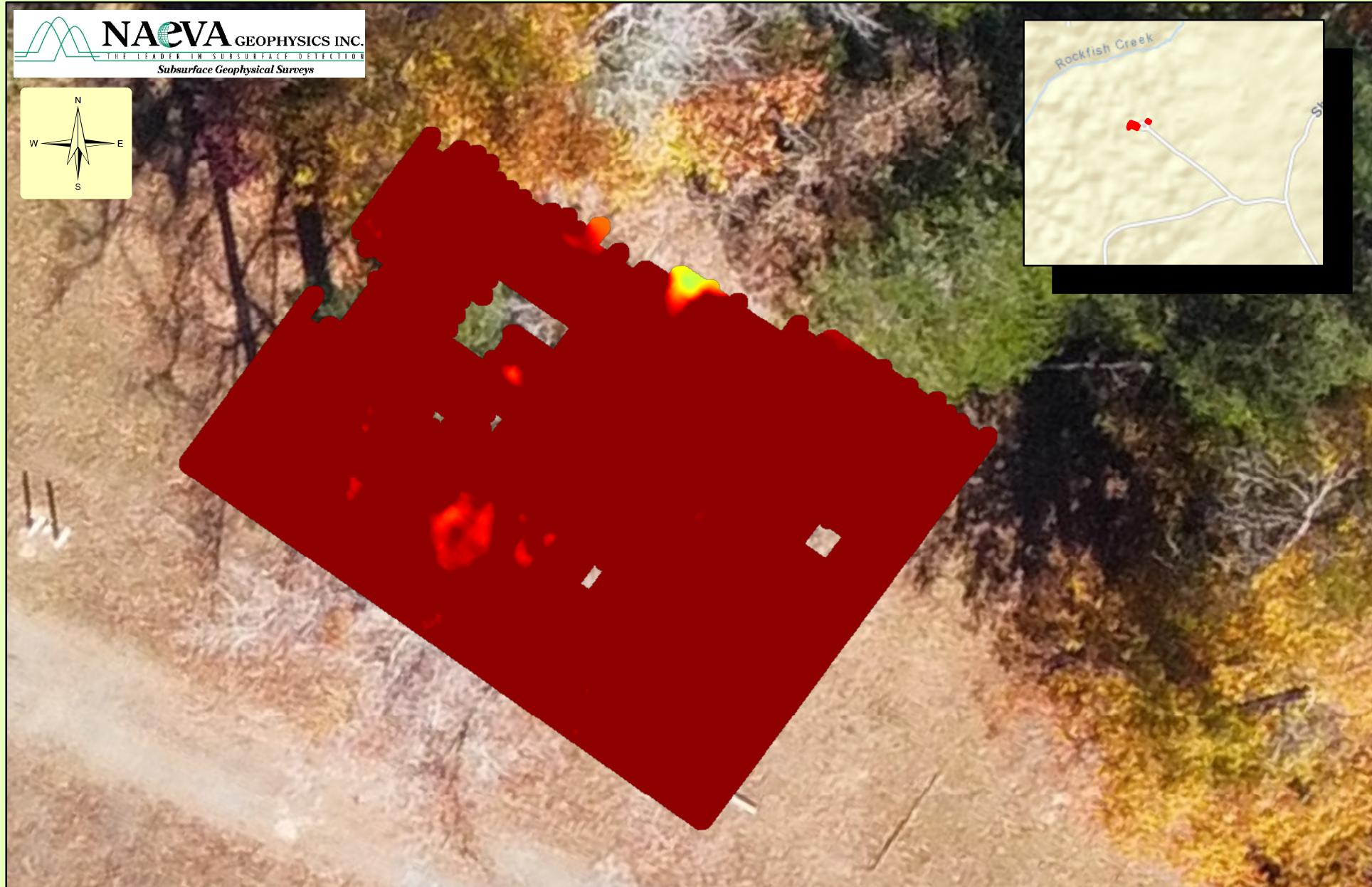
0 1.5 3 6 9 12 Meters

Small Cemetery

Surface Features

Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

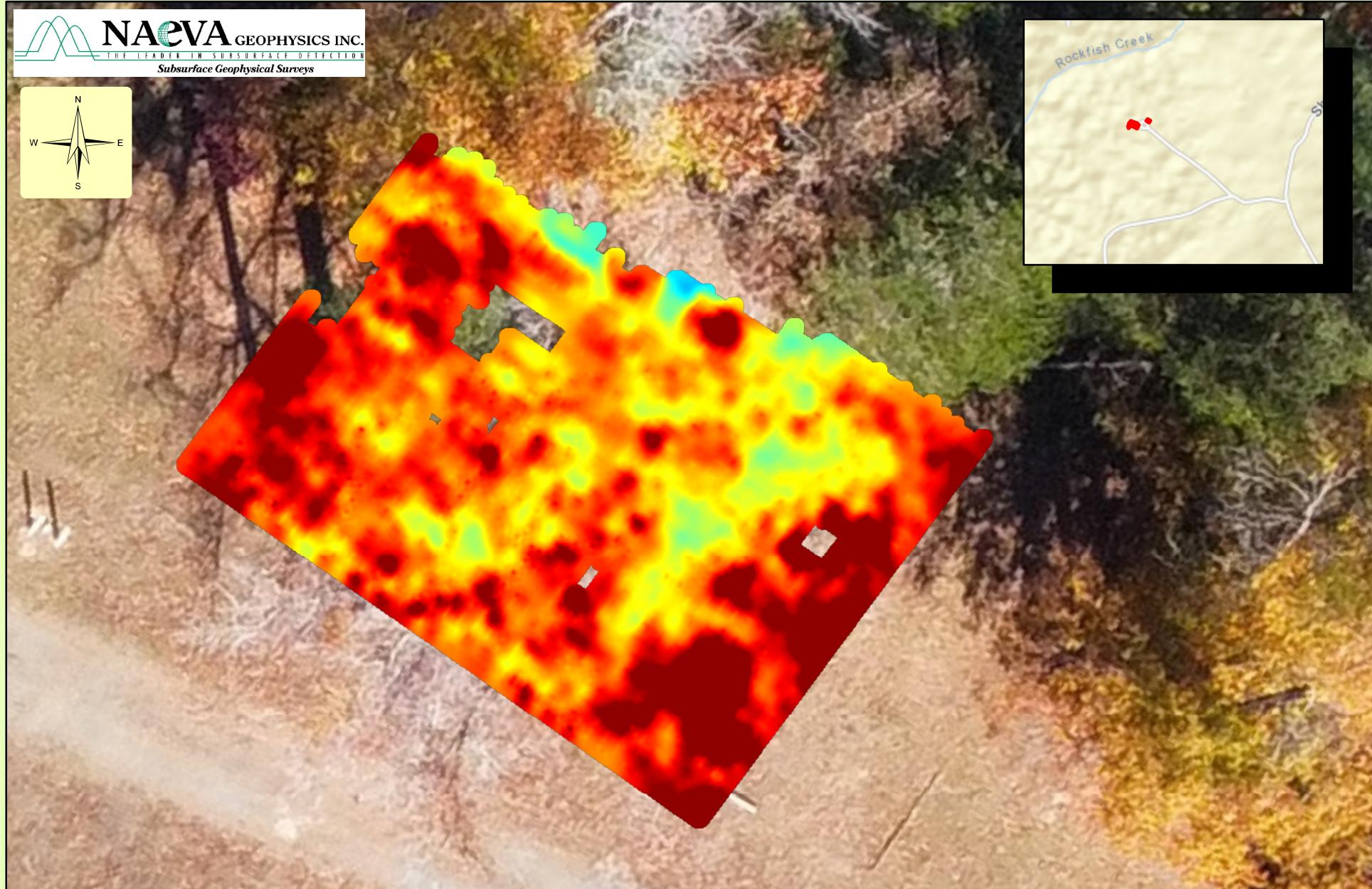
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 0 [0-10cm]
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Date of Survey: 6-8 November 2023

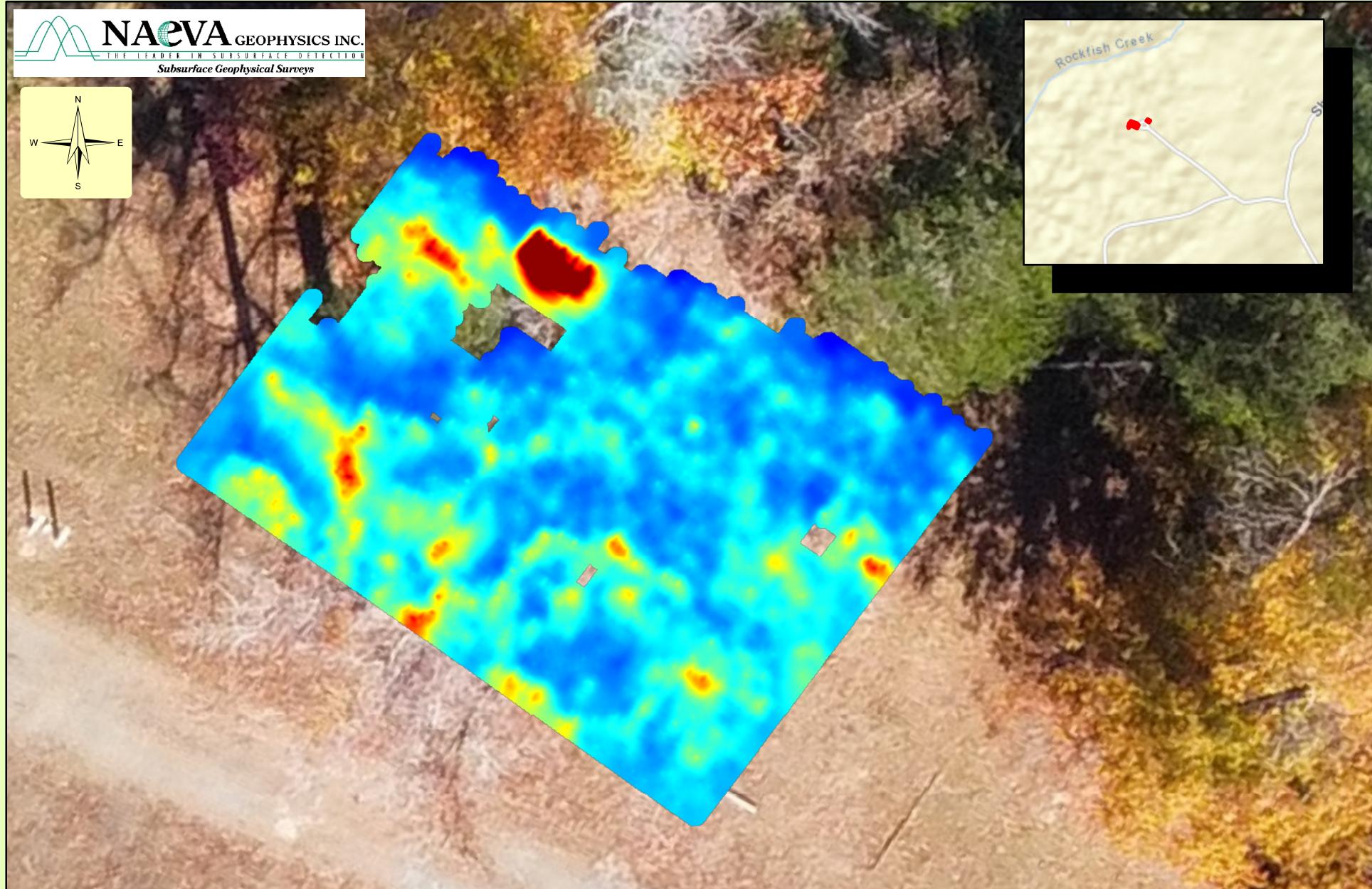
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 1 [10-20cm]
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Date of Survey: 6-8 November 2023

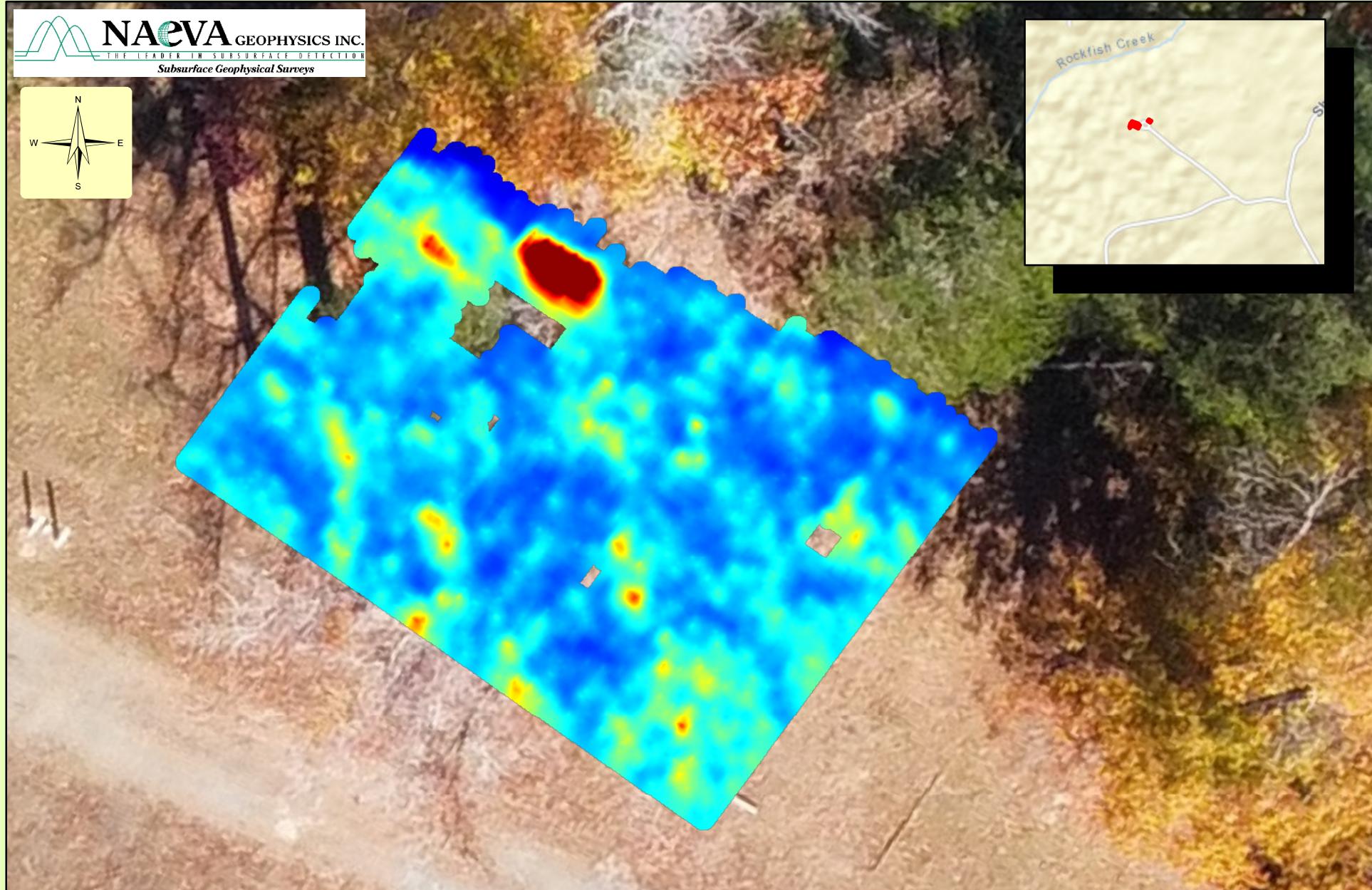
Union Baptist Church Cemetery GPR



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Small Cemetery
Slice 2 [20-30cm]
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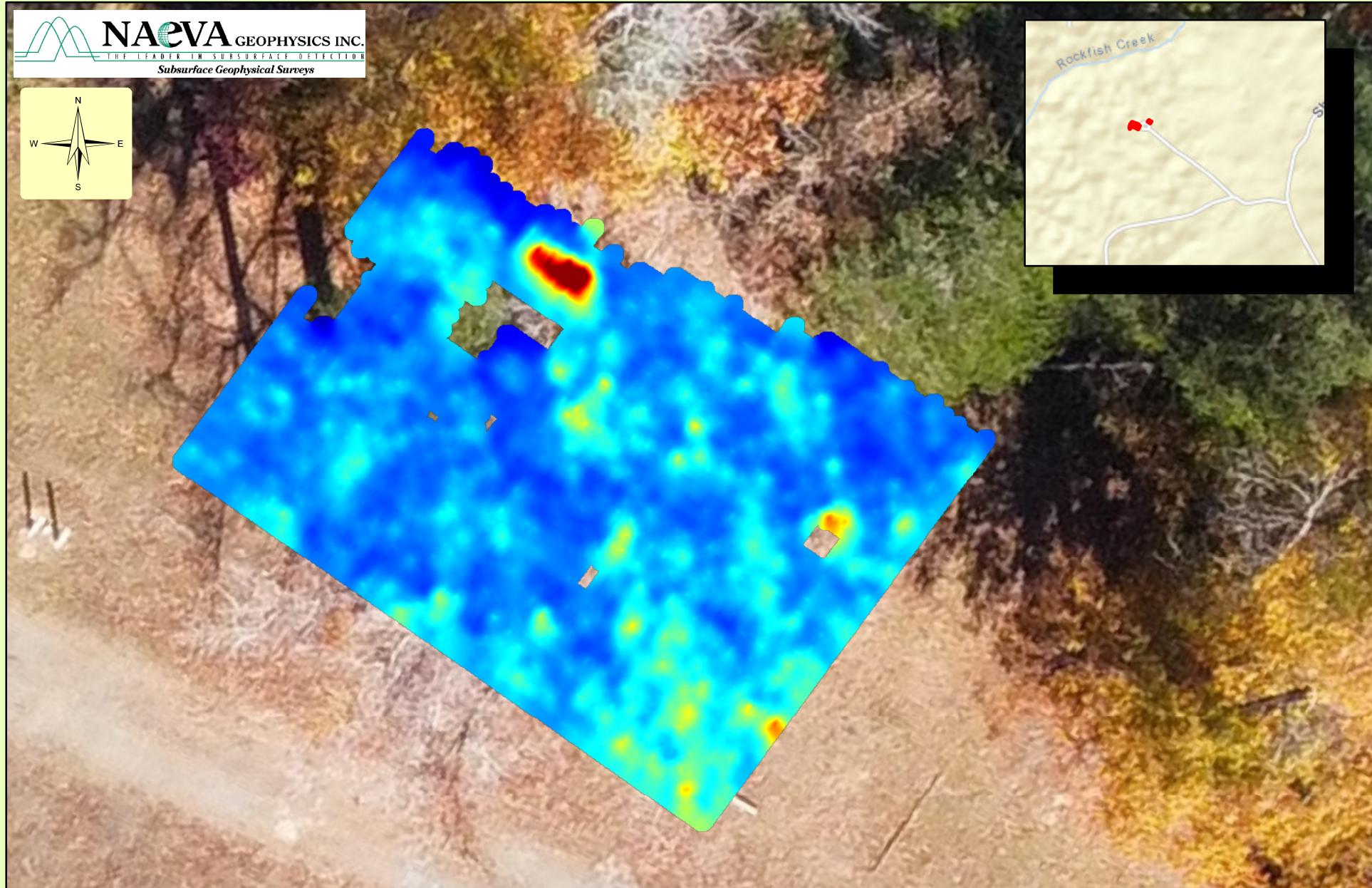
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 3 [30-40cm]
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Date of Survey: 6-8 November 2023

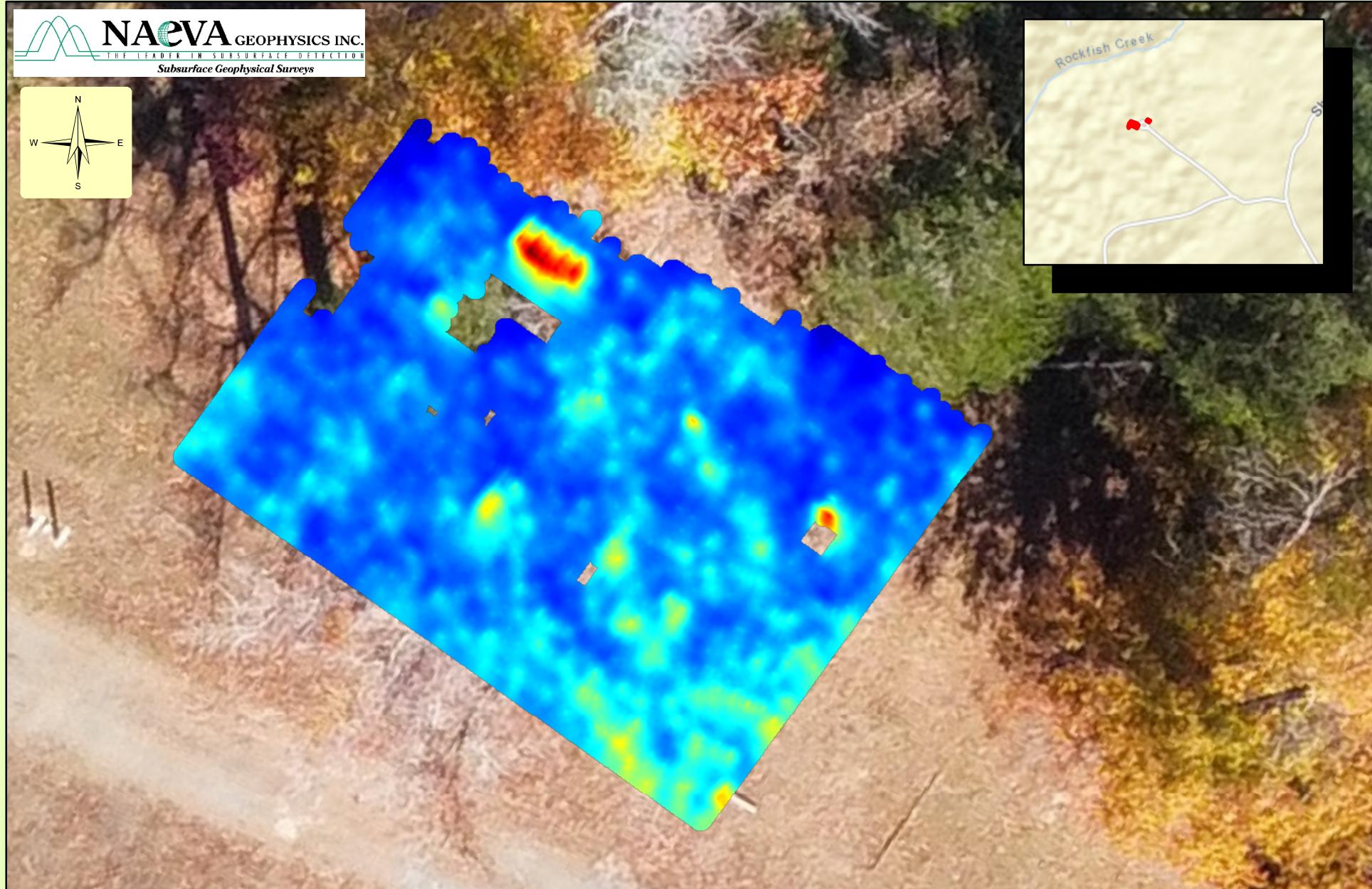
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 4 [40-50cm]
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Date of Survey: 6-8 November 2023

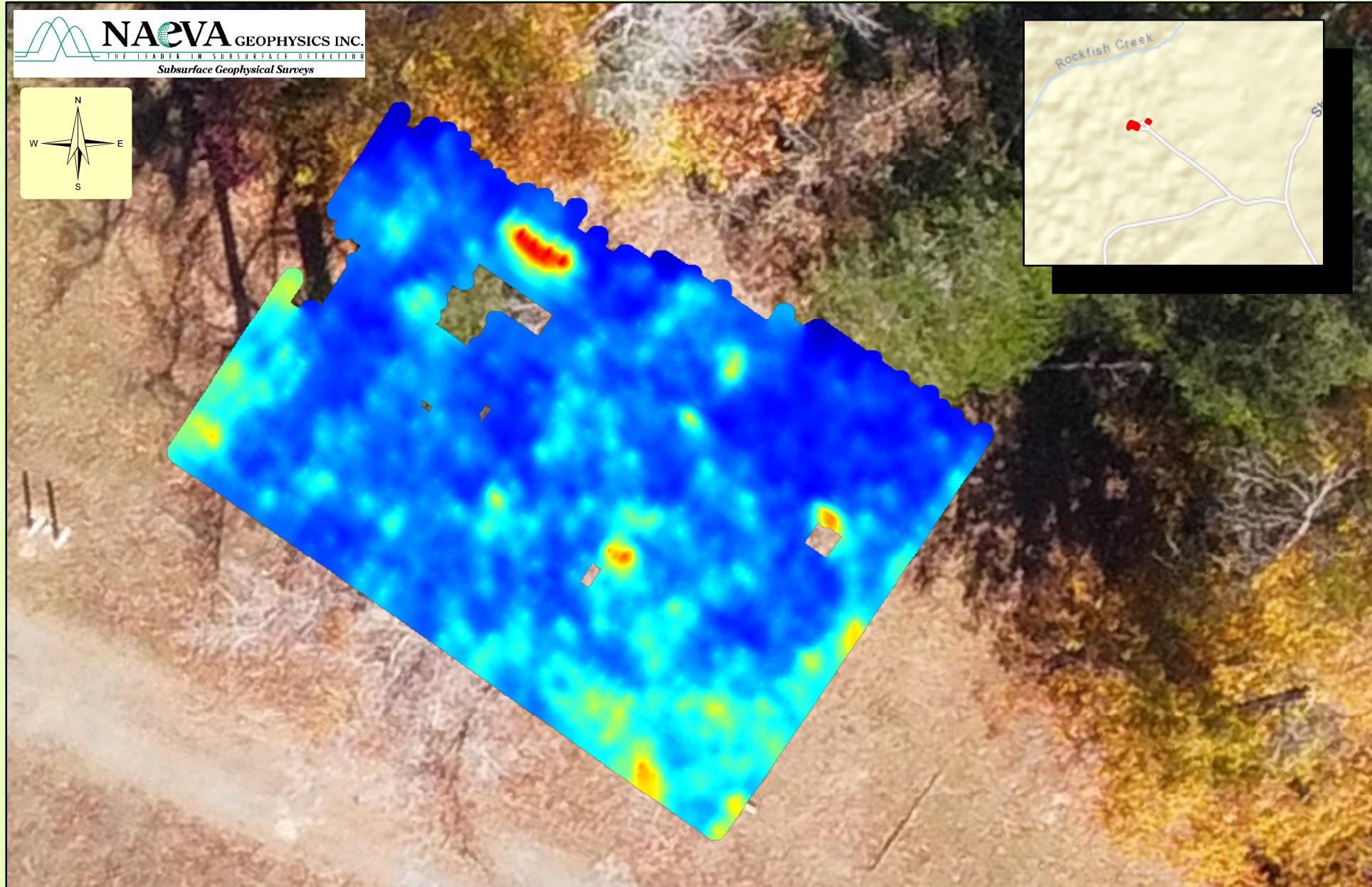
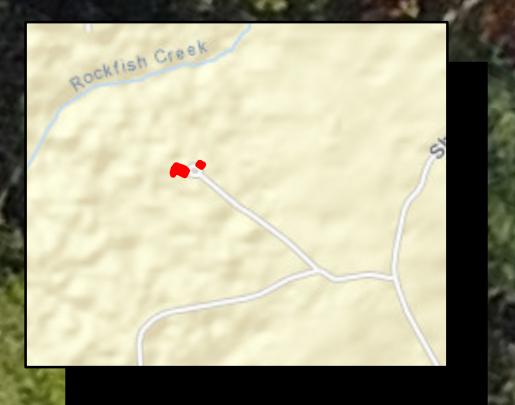
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 5 [50-60cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

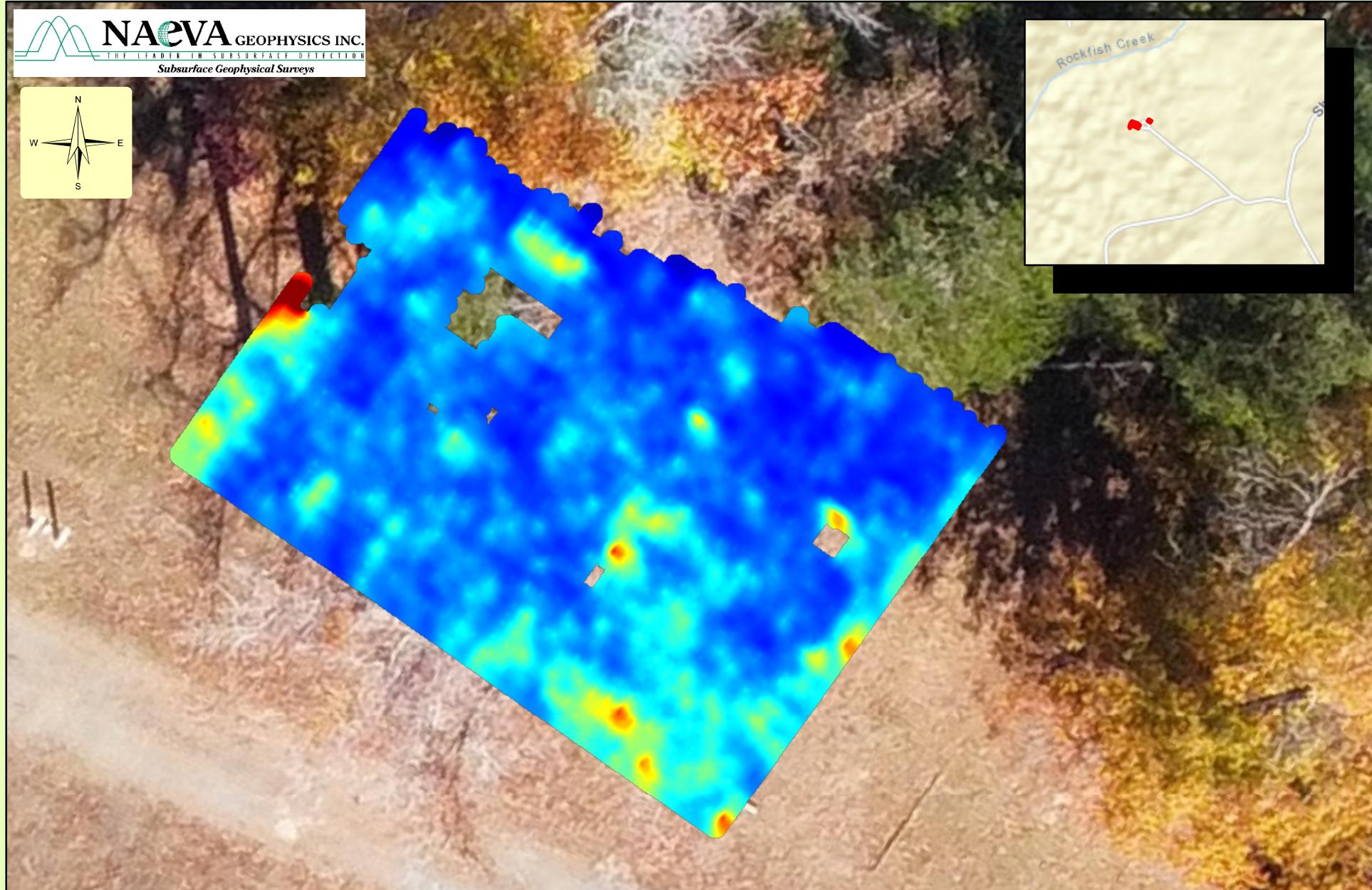
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 6 [60-70cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

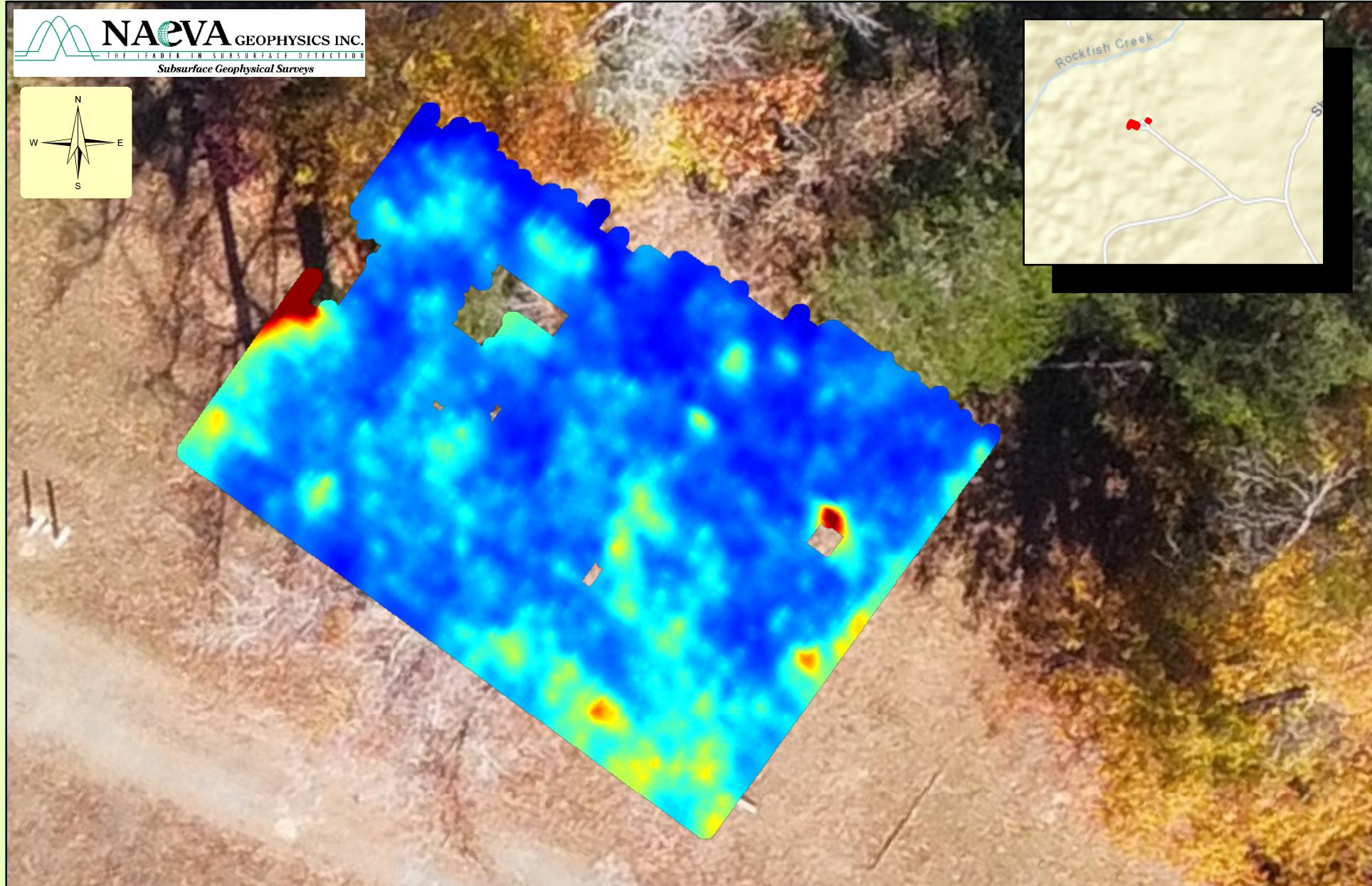
Union Baptist Church Cemetery GPR



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Small Cemetery
Slice 7 [70-80cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

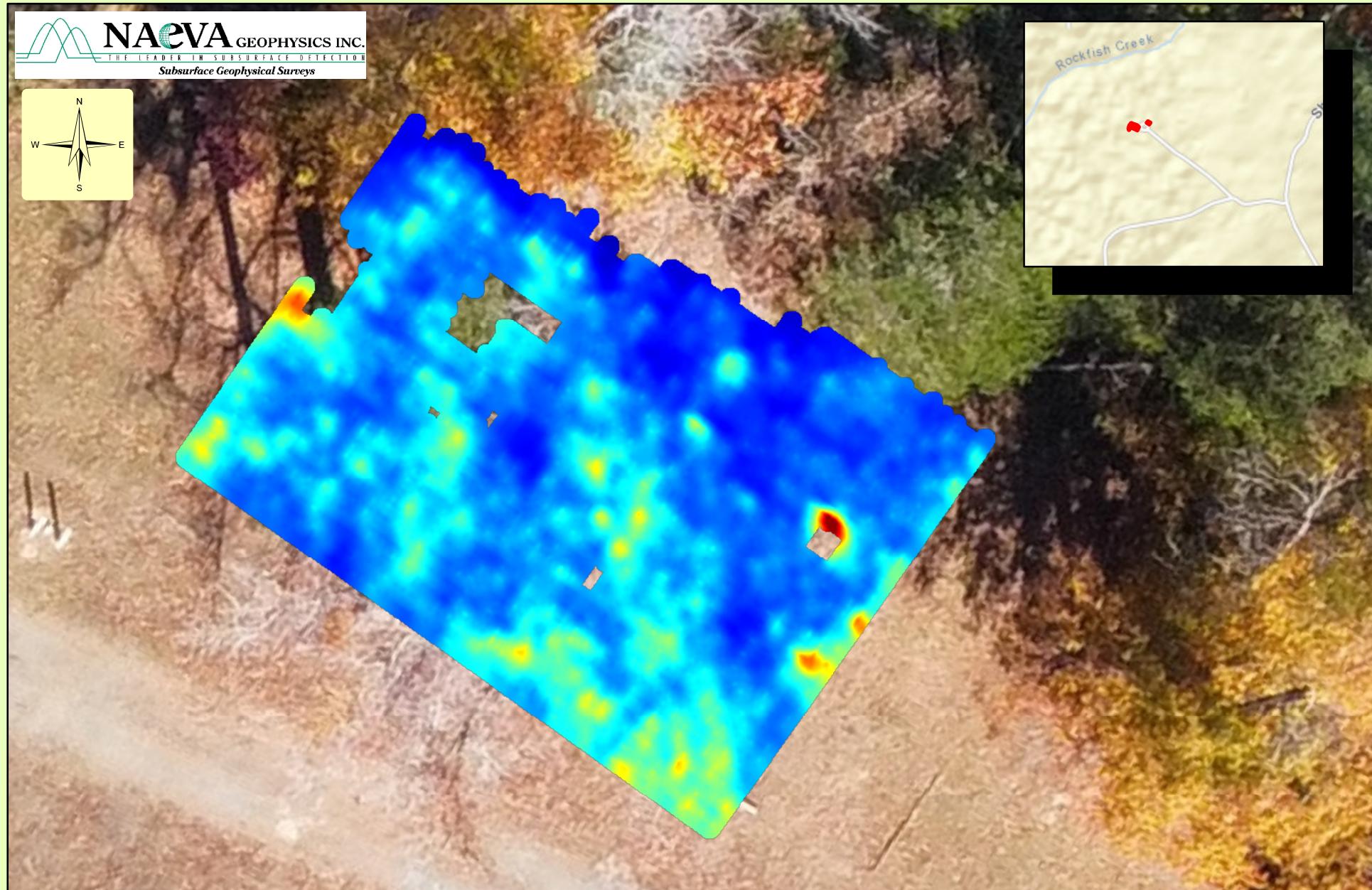
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 8 [80-90cm]
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Date of Survey: 6-8 November 2023

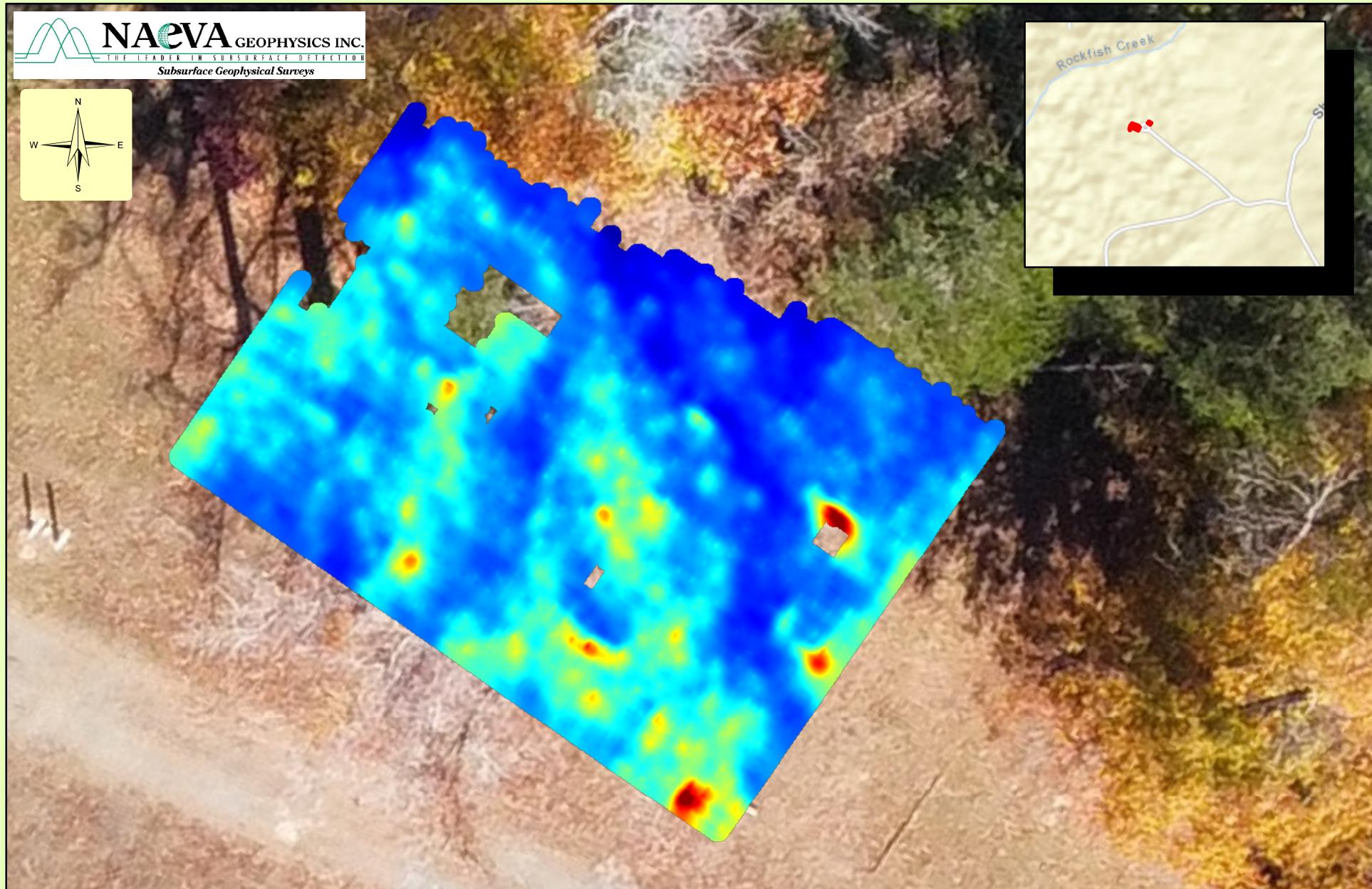
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 9 [90-100cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

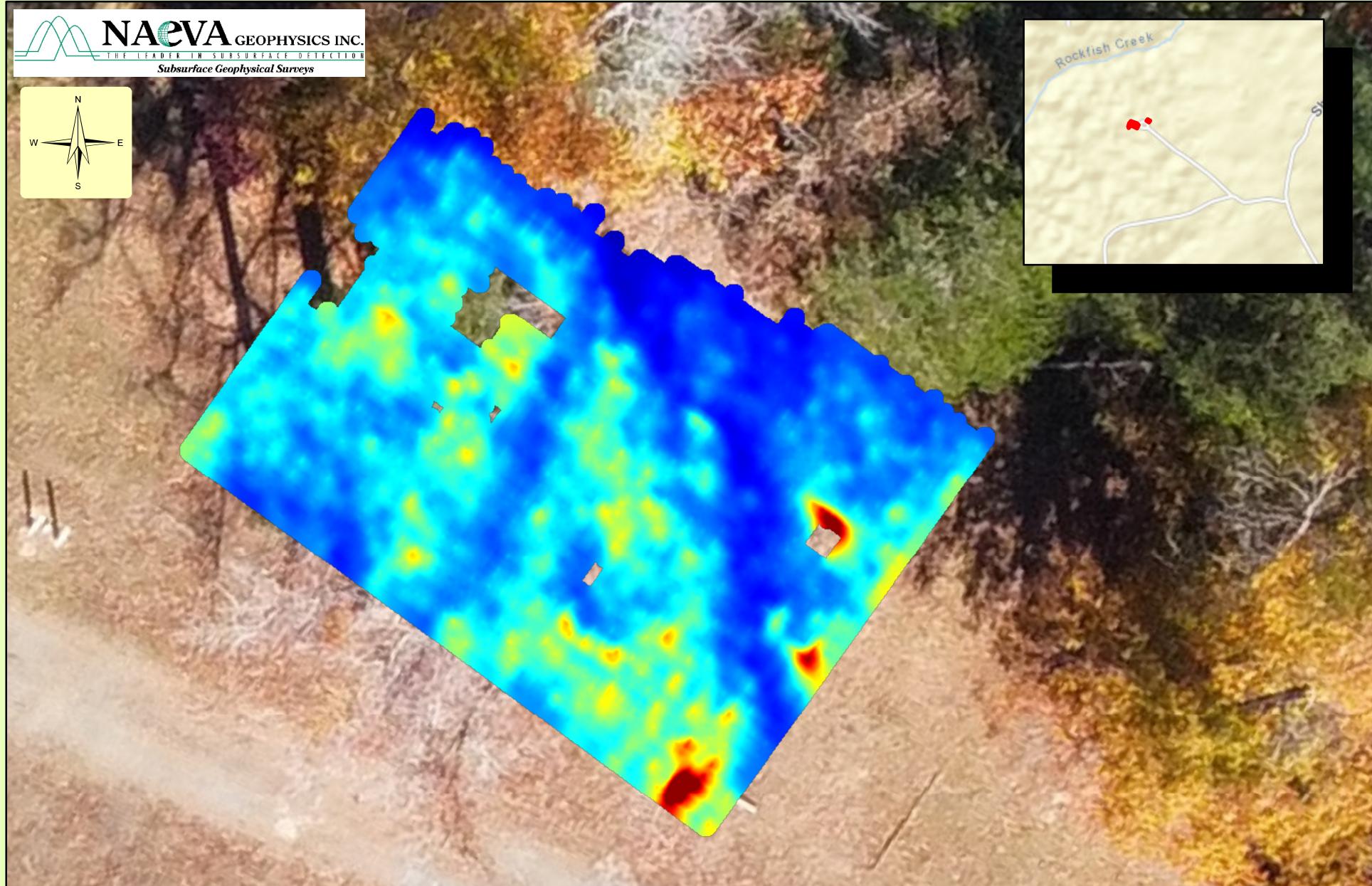
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 10 [100-110cm]
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Date of Survey: 6-8 November 2023

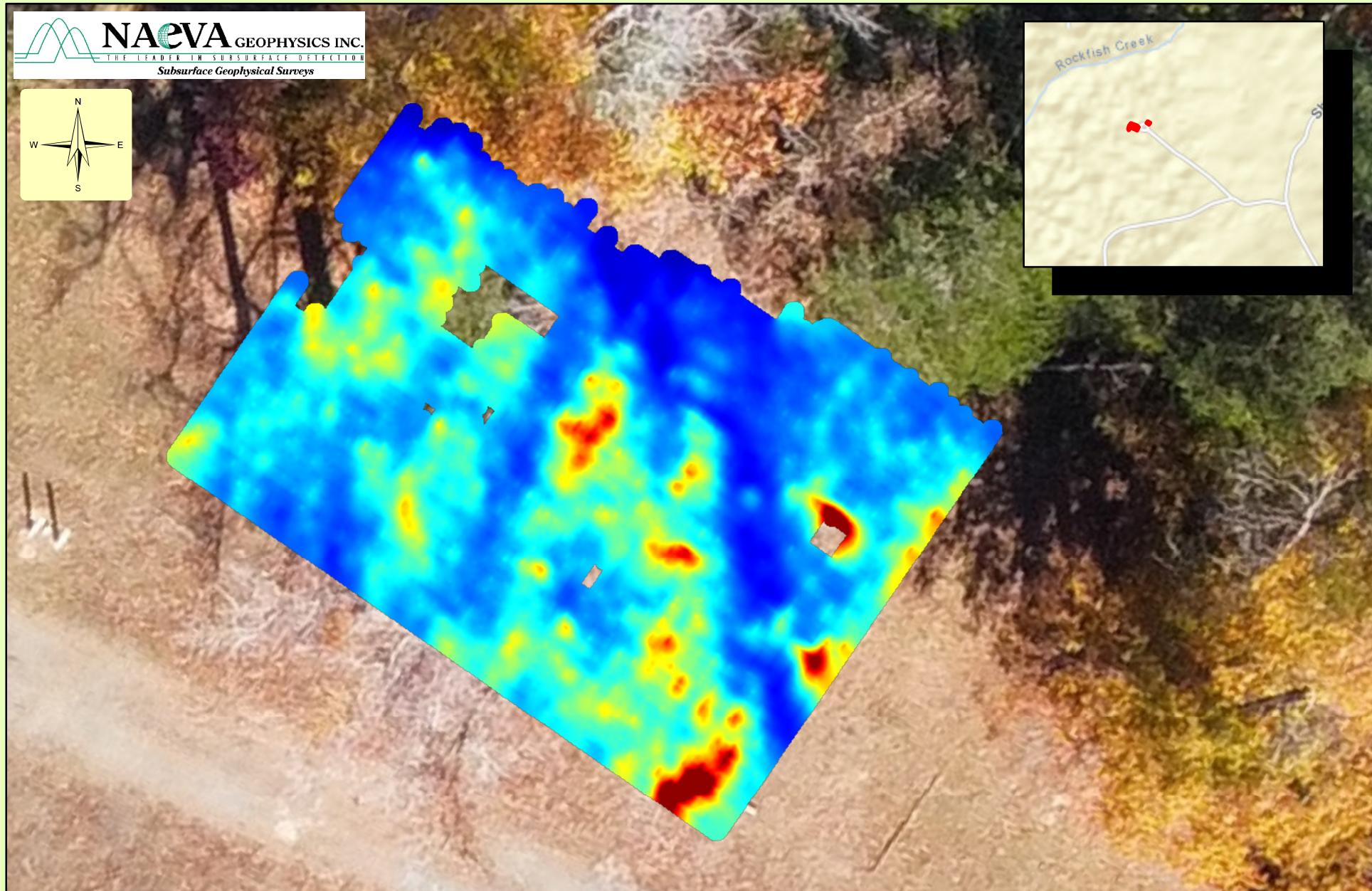
Union Baptist Church Cemetery GPR



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Small Cemetery
Slice 11 [110-120cm]
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Date of Survey: 6-8 November 2023

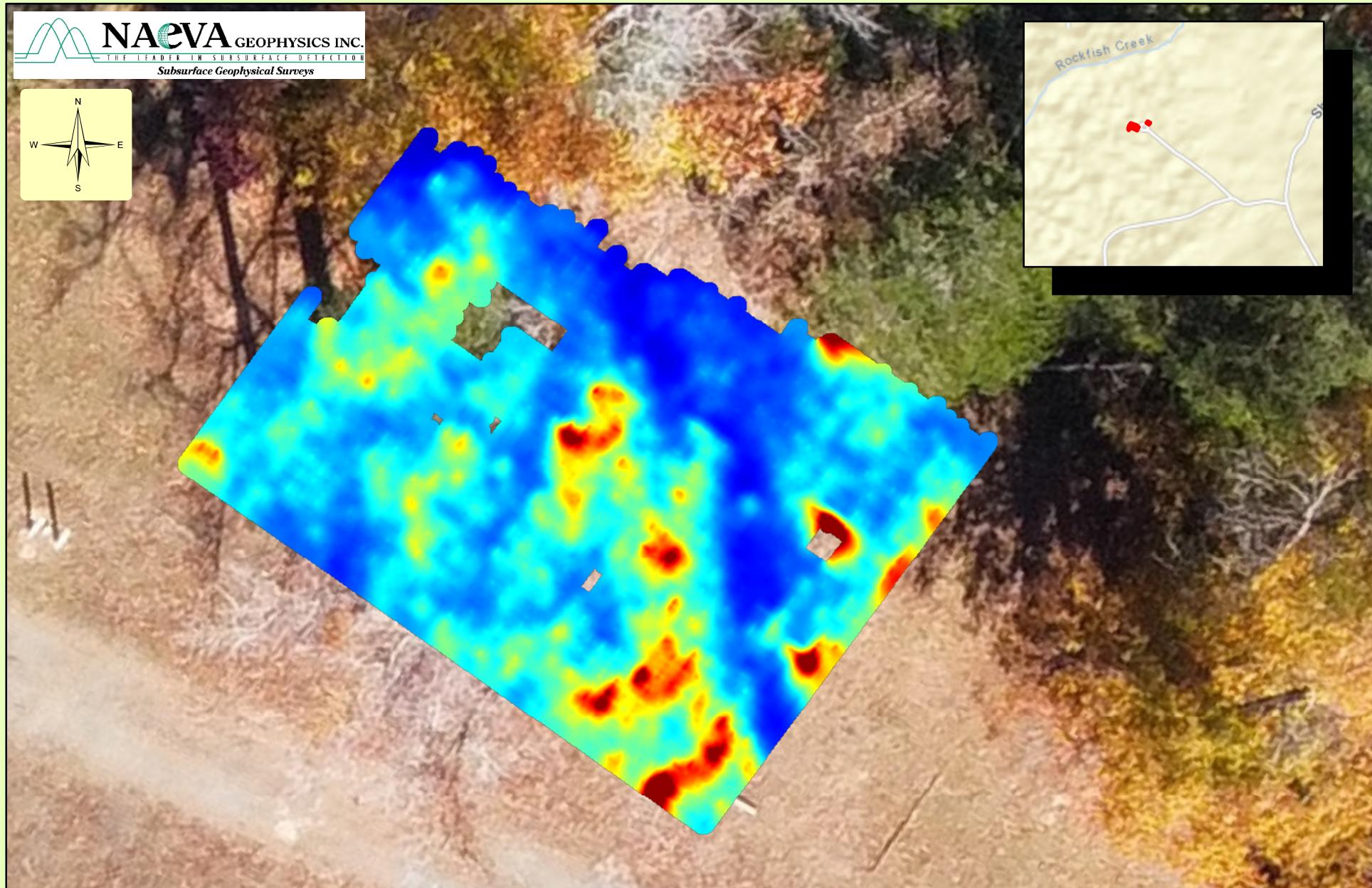
Union Baptist Church Cemetery GPR



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Small Cemetery
Slice 12 [120-130cm]
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Date of Survey: 6-8 November 2023

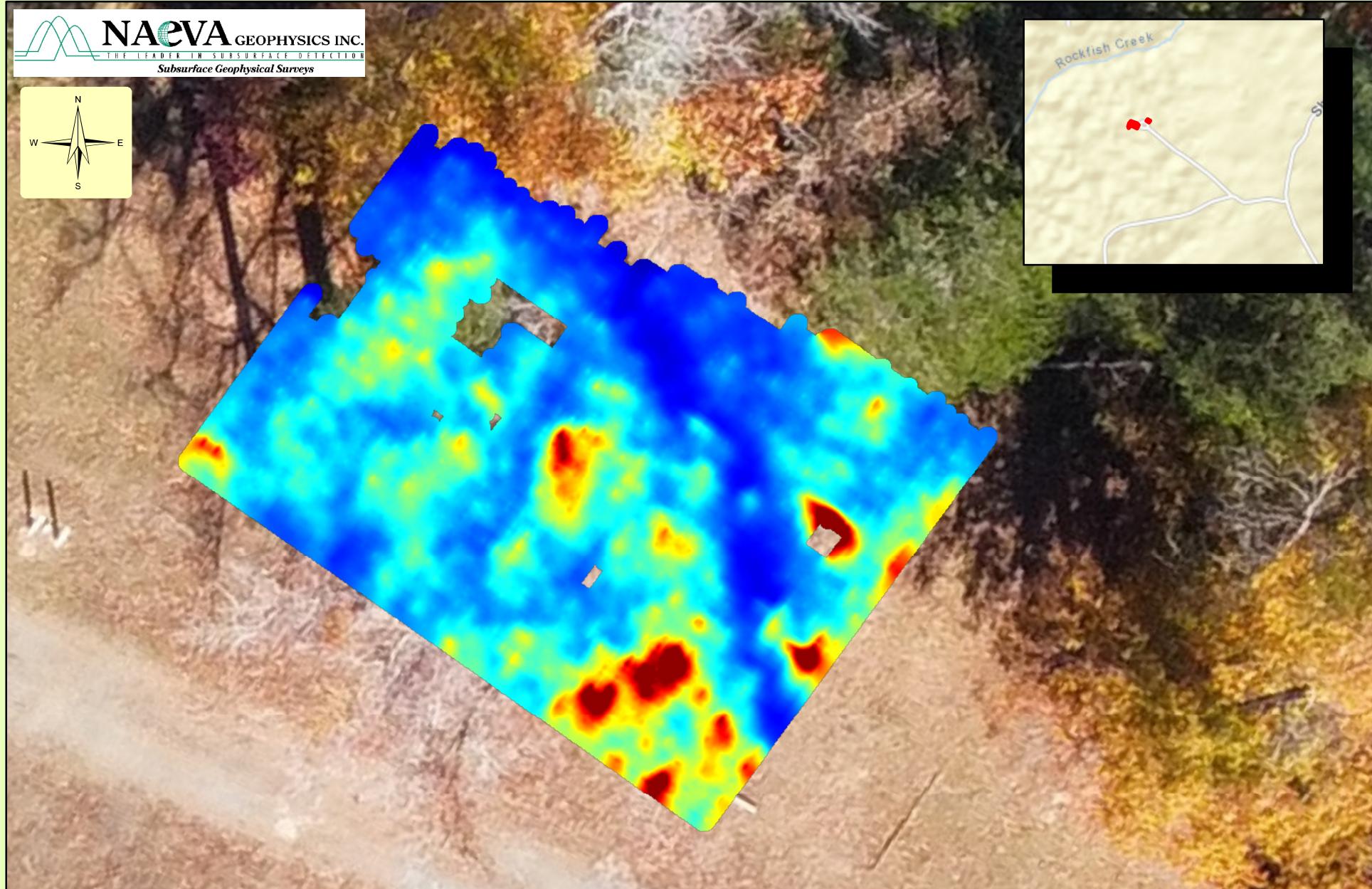
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 13 [130-140cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

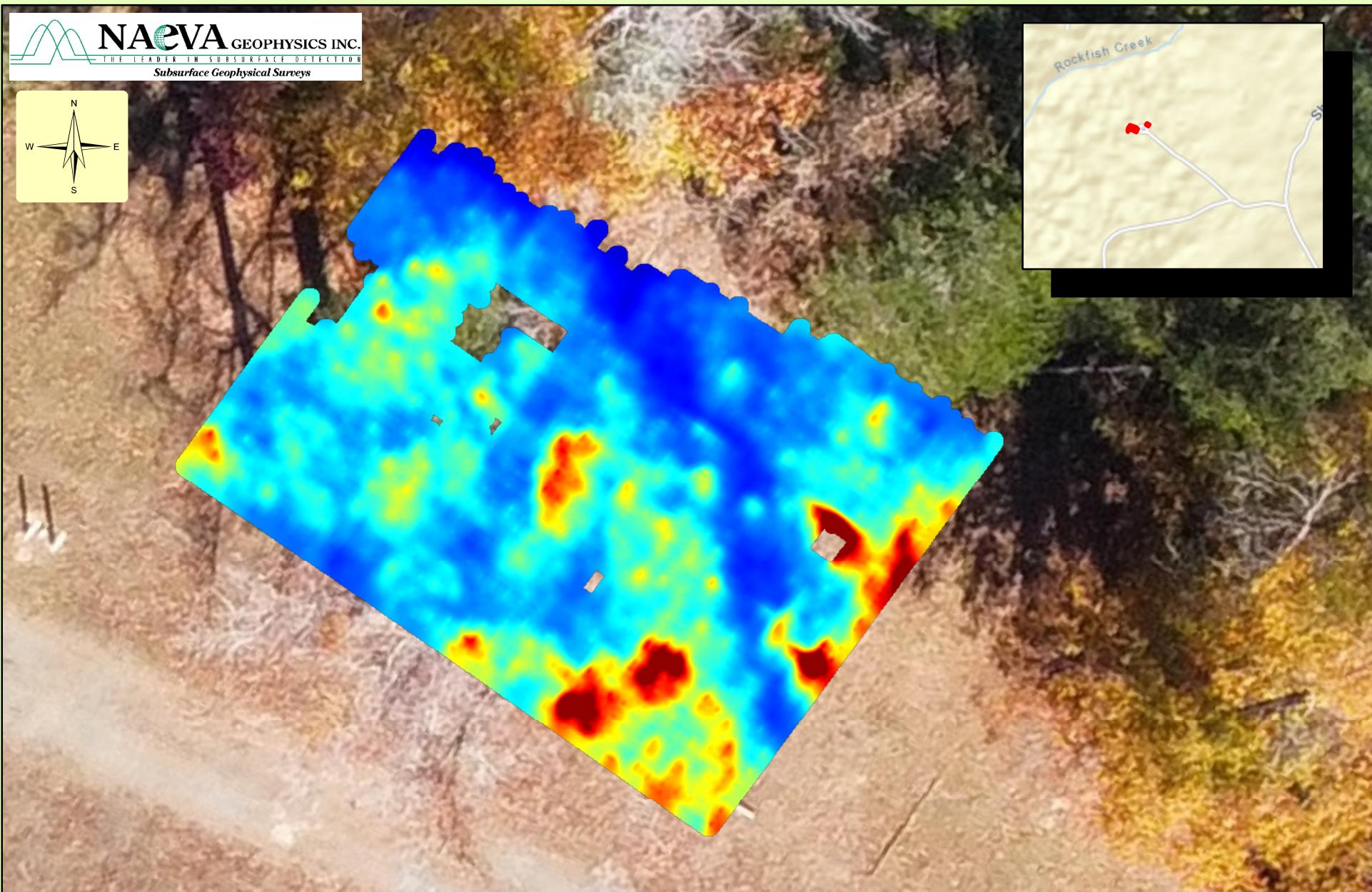
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 14 [140-150cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

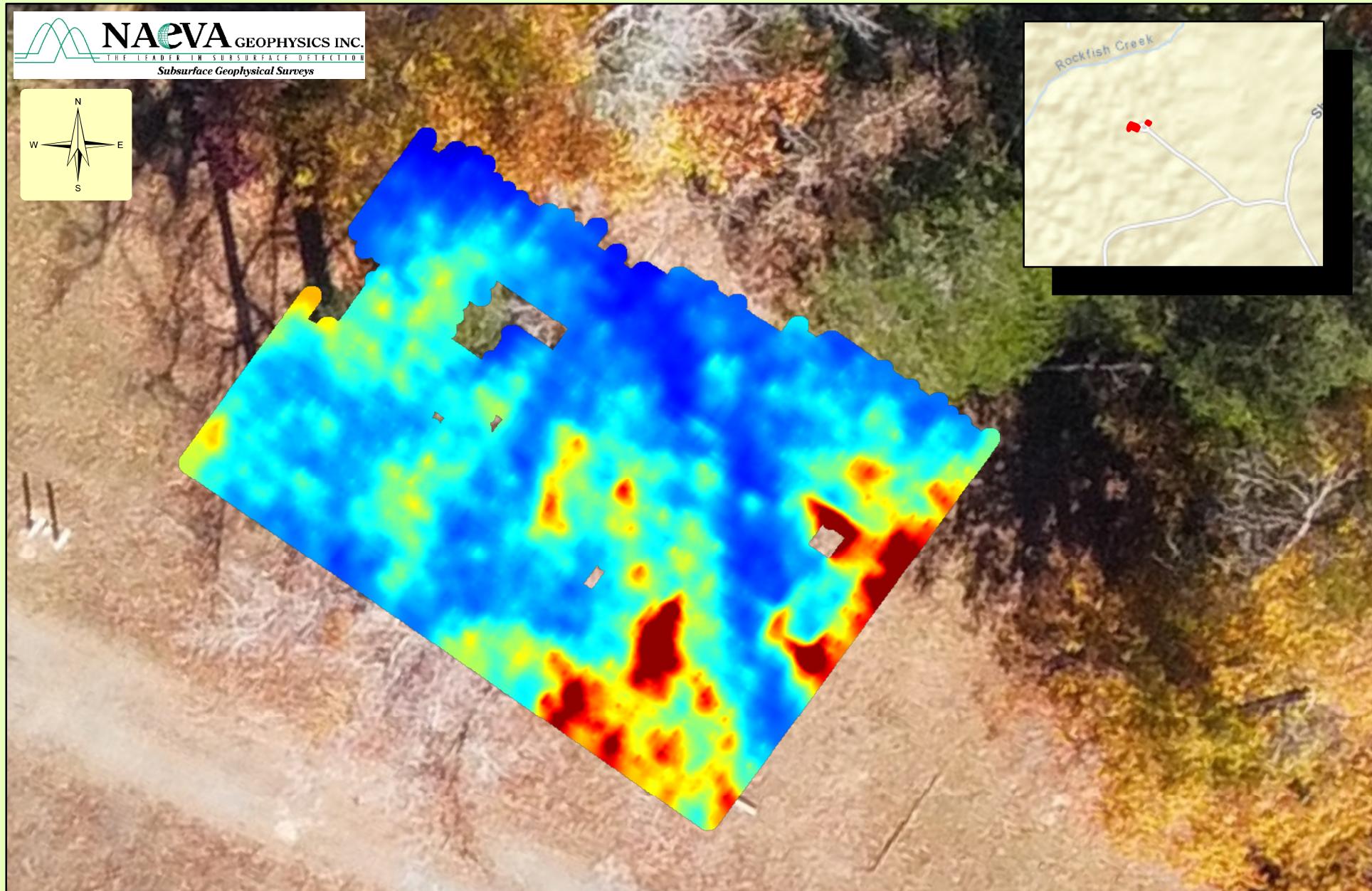
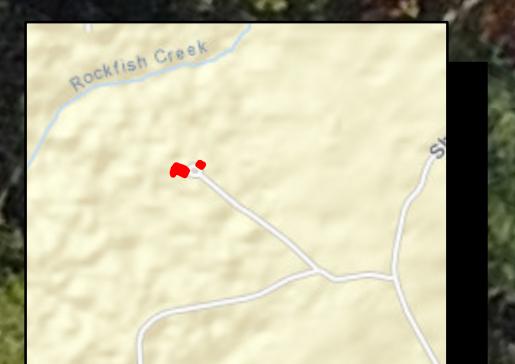
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 15 [150-160cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

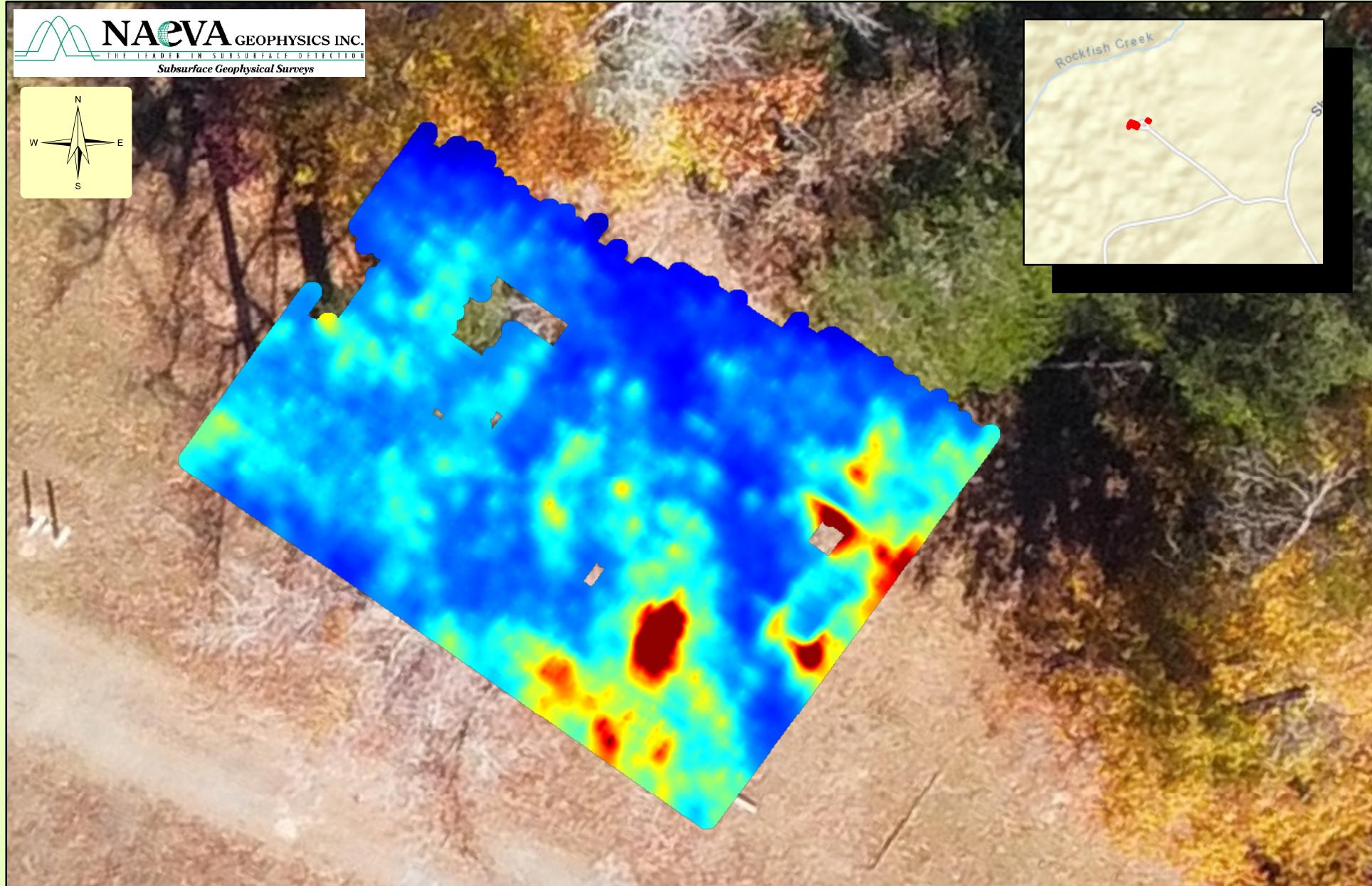
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 16 [160-170cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

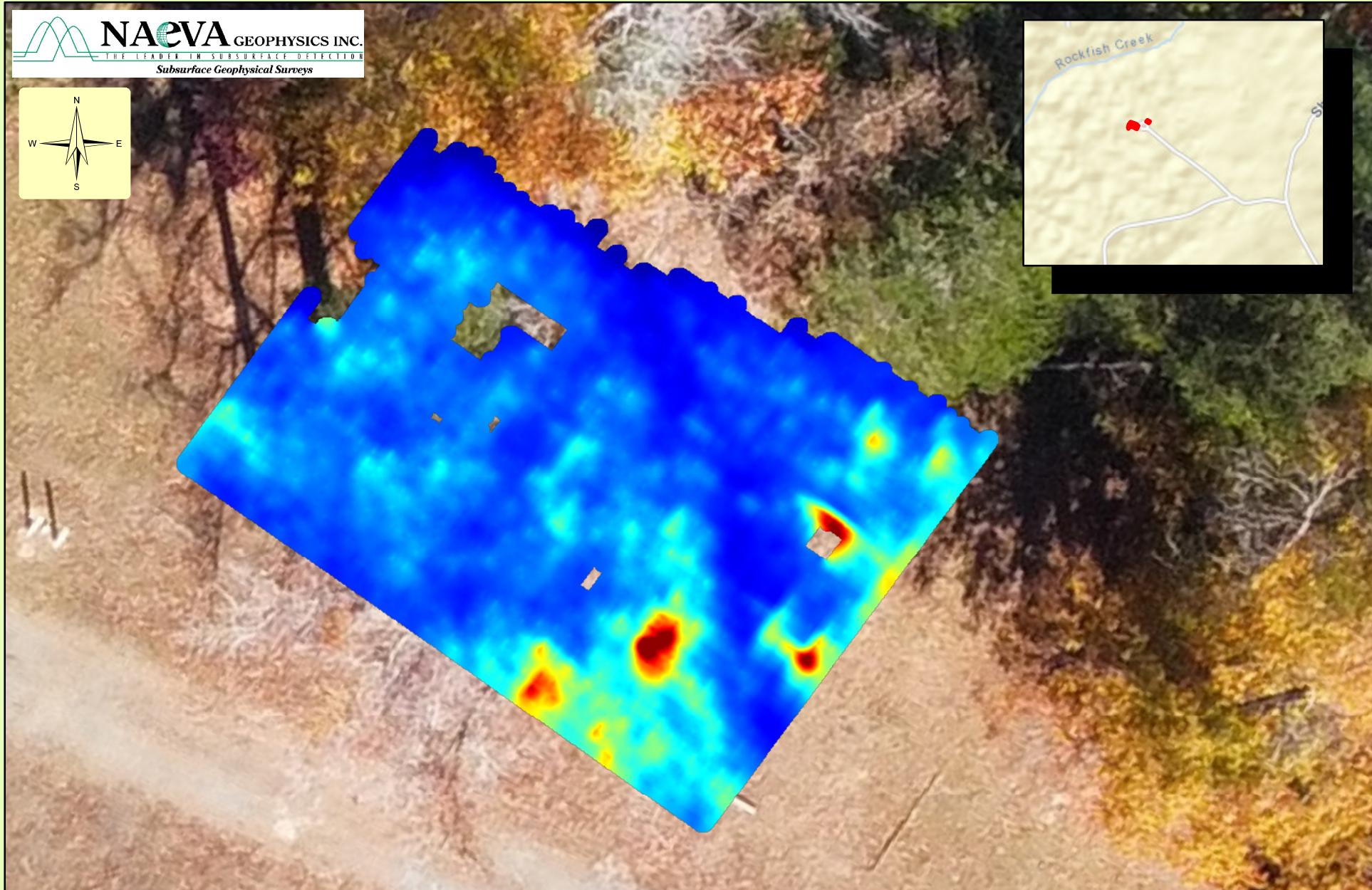
Union Baptist Church Cemetery GPR



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Small Cemetery
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Date of Survey: 6-8 November 2023

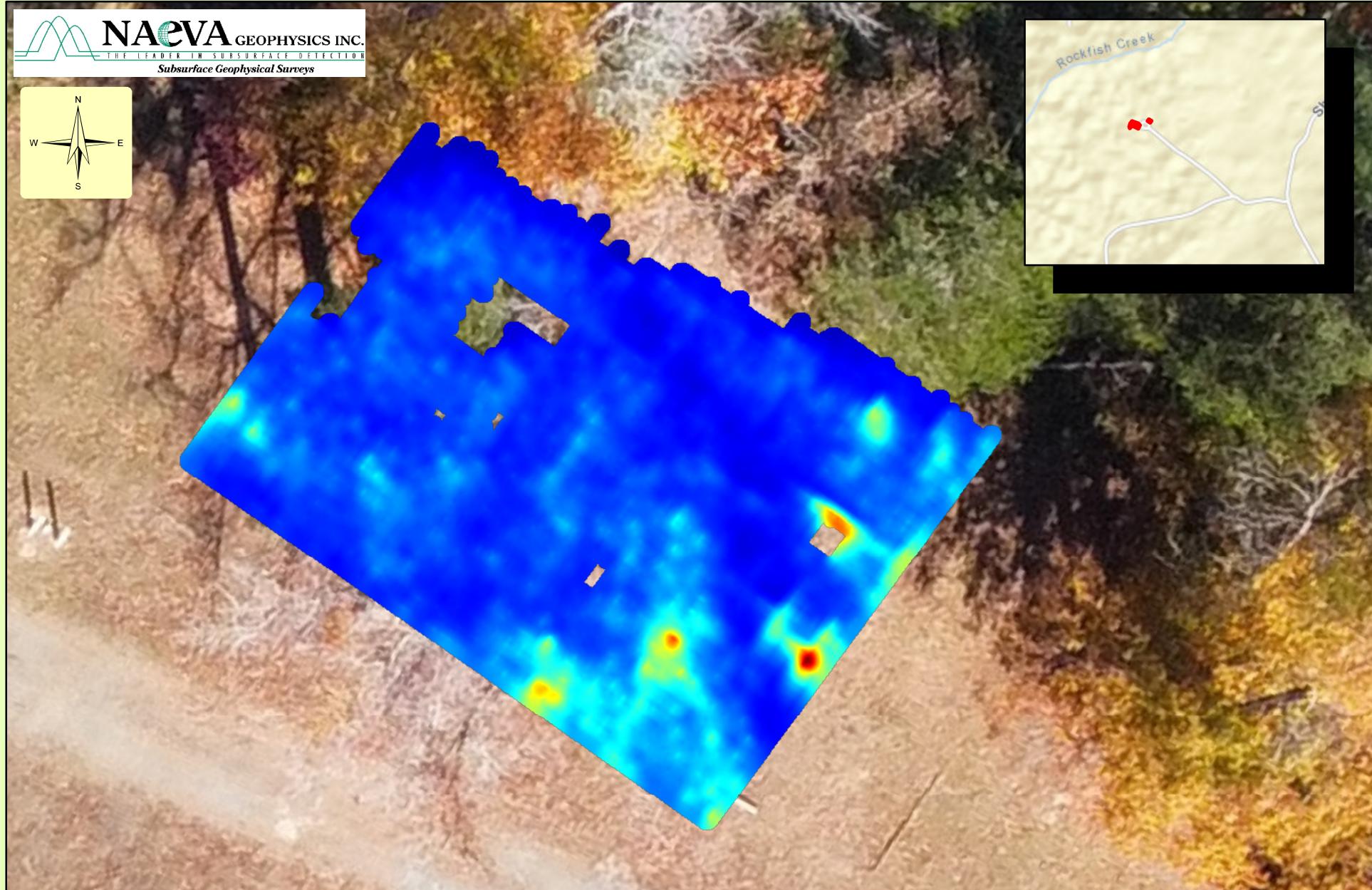
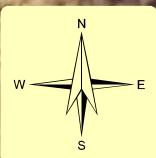
Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 18 [180-190cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Union Baptist Church Cemetery GPR



0 1.5 3 6 9 12 Meters

Small Cemetery
Slice 19 [190-200cm]
Date of map creation: 10 November 2023
Date of Survey: 6-8 November 2023

Property Information

Property Names

Name Explanation Current Name **Name** Union Baptist Church Cemetery

Property Evaluation Status

Not Evaluated

Property Addresses

Current - 714 Union Church Road

County/Independent City(s): Fluvanna (County)

Incorporated Town(s): *No Data*

Zip Code(s): 24590

Magisterial District(s): *No Data*

Tax Parcel(s): *No Data*

USGS Quad(s): SCOTTSVILLE

Additional Property Information

Architecture Setting: Rural

Acreage: .3

Site Description:

November 2023: The Union Baptist Church (Shores) Cemetery is located on a slightly south sloping hillside adjacent to and 50 feet west of the Union Baptist Church sanctuary. The cemetery possesses a wire fence along its northern and western boundaries. The original core of the present Union Baptist Church was built ca. 1886 and possesses a 20th century western addition. Both are frame structures. A gravel loop drive surrounds the church structure and connects it to Rte. 640 to the east.

Surveyor Assessment:

November 2023: The Union Baptist Church Cemetery is not a contributing element to a larger historic resource, it does not meet any of the seven Criteria Considerations, nor does it possess research and information potential under Criterion D.

Surveyor Recommendation: Recommended Not Eligible

Ownership

Ownership Category	Ownership Entity
Private	<i>No Data</i>

Primary Resource Information

Resource Category: Funerary

Resource Type: Cemetery

NR Resource Type: Site

Historic District Status: *No Data*

Date of Construction: Ca 1870

Date Source: Oral History

Historic Time Period: Reconstruction and Growth (1866 - 1916)

Historic Context(s): Funerary

Other ID Number: *No Data*

Architectural Style: Vernacular

Form: *No Data*

Number of Stories: *No Data*

Condition: Good

Threats to Resource: None Known

Cultural Affiliations: African American

Cultural Affiliation Details:

No Data

Architectural Description:

November 2023: The Union Baptist Church Cemetery is fenced on its northern and eastern boundaries. A gate in the northeast corner facilitates pedestrian entrance into the cemetery. Neat rows of grave markers form rows of burials within the cemetery. The northern and western portion of the cemetery possess numerous fieldstone head and foot markers, as well as subtle grave slumps. Towards the south, more modern commercial grave markers and cement bounded family plots are present. A limited amount of vegetation, predominantly cedar and other evergreen trees, and smaller yucca plantings are present. The southern portion of the cemetery is still used today for contemporary burials.

Cemetery Information

Current Use: Religious
Historic Religious Affiliation: Baptist
Ethnic Affiliation: African Descent
Has Marked Graves: True
Has Unmarked Graves: True
Enclosure Type: Fence
Number Of Gravestones: 101 - 999
Earliest Marked Death Year: 1880
Latest Marked Death Year: 2017

Secondary Resource Information

Historic District Information

Historic District Name: No Data
Local Historic District Name: No Data
Historic District Significance: No Data

CRM Events

Event Type: Other

Project Review File Number: No Data
Investigator: Benjamin Ford
Organization/Company: Rivanna Archaeological Services, LLC
Photographic Media: Digital
Survey Date: 11/8/2023
Dhr Library Report Number: No Data
Project Staff/Notes:

Rivanna Archaeological Services, LLC hired NAEVA Geophysics, Inc. to conduct a GPR Survey of a portion of the cemetery at Union Baptist Church (Shores), in Fluvanna County, Virginia. The GPR Survey was managed by Mark Howard. Rivanna Archaeological Services interpreted the findings, provided a summary historic context, and produced the site report.

Project Bibliographic Information:

Horace Scruggs, "Interview with Bertha Armstrong. In 'Reconstructed: The Rebuilding of African American communities Through Faith and Education.' Video presentation, <https://www.facebook.com/watch/?v=609623200768619>, accessed March 15, 2024.

Fluvanna Leaders for Race and Diversity. "A History of African American Churches in Fluvanna County." Powerpoint presentation.

Bibliographic Information

Bibliography:

No Data

Property Notes:

No Data

Legend

- Architecture Resources
- Architecture Labels
- Individual Historic District Properties
- Archaeological Resources
- Archaeology Labels
- DHR Easements
- County Boundaries



Feet

0 50 100 150 200
1:2,500 / 1"=208 Feet

Title: Architecture Labels**Date: 4/22/2024**

DISCLAIMER: Records of the Virginia Department of Historic Resources (DHR) have been gathered over many years from a variety of sources and the representation depicted is a cumulative view of field observations over time and may not reflect current ground conditions. The map is for general information purposes and is not intended for engineering, legal or other site-specific uses. Map may contain errors and is provided "as-is". More information is available in the DHR Archives located at DHR's Richmond office.

Notice of AE sites: Locations of archaeological sites may be sensitive to the National Historic Preservation Act (NHPA), and the Archaeological Resources Protection Act (ARPA) and Code of Virginia §2.2-3705.7 (10). Release of precise locations may threaten archaeological sites and historic resources.

